



STIC Search Report

Biotech-Chem Library

STIC Database Tracking Number: 123592

TO: Gerald G Leffers
Location: REM/2A69/2C70
Art Unit: 1636
Thursday, June 03, 2004

Case Serial Number: 09/769699

From: Alex Waclawiw
Location: Biotech-Chem Library
Rem 1A71
Phone: 272-2534

Alexandra.waclawiw@uspto.gov

Search Notes

STIC-Biotech/ChemLib

123592

DATE

From: Leffers, Gerald
Sent: Wednesday, June 02, 2004 2:59 PM
To: STIC-Biotech/ChemLib; Yucel, Irem
Subject: RE: 09/769,699

Can anyone give me a status update for this search? This is an After-Final case that has a fairly tight deadline on it. It would be very useful to be able to allow the claims if they are in fact free of any of the more recently issued patents and/or pending applications. Thank you for your help. Gerry Leffers

Gerald G. Leffers Jr., PhD

Primary Examiner, Art Unit 1636
Remsen Building, Room 02A69
(571) 272-0772

-----Original Message-----

From: Fredman, Jeffrey
Sent: Thursday, May 20, 2004 9:39 AM
To: STIC-Biotech/ChemLib
Cc: Leffers, Gerald
Subject: FW: 09/769,699

seq 2-120377A

PLEASE RUSH.

I Approve.

Jeff Fredman

-----Original Message-----

From: Leffers, Gerald
Sent: Thursday, May 20, 2004 8:01 AM
To: Fredman, Jeffrey
Subject: 09/769,699

Hi Jeff, please approve a RUSH updated search of issued and pending files for SEQ ID NO: 2 of this application (~1,200 amino acid residues). This is an After-Final that may well be allowable. As always, thank you for your help. Gerry

Gerald G. Leffers Jr., PhD

Primary Examiner, Art Unit 1636
Remsen Building, Room 02A69
(571) 272-0772

RECEIVED
JUN -2 2004
(STIC)

Point of Contact:
Alexandra Wacławiw
Technical Info. Specialist
GMT 6A02 Tel: 308-4491

Searcher: _____
Phone: _____
Location: _____
Date Picked Up: 6-3-04
Date Completed: 6-3-04
Searcher Prep/Review: 7
Clerical: _____
Online time: 7

TYPE OF SEARCH:

NA Sequences: _____
AA Sequences: ①
Structures: _____
Bibliographic: _____
Litigation: _____
Full text: _____
Patent Family: _____
Other: _____

VENDOR/COST (where applic.)

STN: _____
DIALOG: _____
Questel/Orbit: _____
DRLink: _____
Lexis/Nexis: _____
Sequence Sys.: _____
WWW/Internet: _____
Other (specify): compuser

OM protein - protein search, using sw model

Run on: June 3, 2004, 07:04:28 ; Search time 23 Seconds
(without alignment)
2700.263 Million cell updates/sec

Title: US-09-769-699-2

Perfect score: 6294

Sequence: 1 MENTQKTVPTGFLGVYA.....DELFDLSGPIKGNINTEM 1203

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 389414 seqs, 51625971 residues

Total number of hits satisfying chosen parameters: 389414

Minimum DB seq length: 0

Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Database : Issued Patents AA:*

1: /cgn2_6/prodata/2/iaa/5A_COMB pep:*

2: /cgn2_6/prodata/2/iaa/5B_COMB pep:*

3: /cgn2_6/prodata/2/iaa/6A_COMB pep:*

4: /cgn2_6/prodata/2/iaa/6B_COMB pep:*

5: /cgn2_6/prodata/2/iaa/PCTUS COMB pep:*

6: /cgn2_6/prodata/2/iaa/backfiles1 pep:*

Pred. No. is the number of results predicted by chance to have a
score greater than or equal to the score of the result being printed,
and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	3054	48.5	1452	4	US-09-127-227-2
2	183	2.9	35	2	Sequence 2, Appli
3	183	2.9	35	3	Sequence 9, Appli
4	131	2.1	757	3	Sequence 84, Appli
5	123	2.0	1074	4	Sequence 358, App
6	123	2.0	1074	4	Sequence 394, App
7	122	1.9	1096	4	Sequence 5764, Ad
8	118.5	1.9	370	4	Sequence 16913, A
9	117	1.9	855	4	Sequence 12681, A
10	111	1.8	4630	4	Sequence 2, Appli
11	111	1.8	5215	3	Sequence 2, Appli
12	110	1.7	790	4	Sequence 6059, Ap
13	106.5	1.7	3567	2	Sequence 4, Appli
14	106.5	1.7	3567	3	Sequence 4, Appli
15	106	1.7	774	1	Sequence 7, Appli
16	106	1.7	774	2	Sequence 3855, Ap
17	105.5	1.7	1095	4	Sequence 46, Appl
18	105	1.7	774	1	Sequence 48, Appl
19	105	1.7	774	1	Sequence 5, Appli
20	104.5	1.7	635	4	Sequence 5, Appli
21	104.5	1.7	635	4	Sequence 5, Appli
22	104.5	1.7	774	1	Sequence 5, Appli
23	104.5	1.7	1471	4	Sequence 3, Appli
24	103	1.6	774	1	Sequence 3, Appli
25	103	1.6	774	1	Sequence 4, Appli
26	103	1.6	3472	4	Sequence 4, Appli
27	102	1.6	729	1	Sequence 6, Appli

28	102	1.6	729	2	US-08-885-419-6
29	102	1.6	774	1	US-07-747-901A-3
30	102	1.6	774	1	US-07-935-312-3
31	102	1.6	774	1	US-08-633-760-50
32	101.5	1.6	773	1	US-08-019-870-1
33	101.5	1.6	773	1	US-08-019-870-6
34	101.5	1.6	774	1	US-08-019-870-8
35	101.5	1.6	774	1	US-08-019-870-11
36	101.5	1.6	774	1	US-08-633-760-52
37	101	1.6	995	4	US-09-657-931A-1
38	101	1.6	1024	4	US-09-562-737-48
39	101	1.6	1466	4	US-09-262-537-20
40	101	1.6	7257	3	US-09-335-409-5
41	101	1.6	7257	4	US-09-568-102-5
42	101	1.6	7257	4	US-09-567-969-5
43	101	1.6	7257	4	US-09-568-480-5
44	101	1.6	7257	4	US-09-568-486-5
45	101	1.6	7257	4	US-09-568-472-5
46	101	1.6	7257	4	US-09-567-899-5
47	100.5	1.6	1321	1	US-08-261-822A-3
48	100.5	1.6	1321	5	PCT-US95-0774A-3
49	100.5	1.6	2616	6	5206163-3
50	100	1.6	1381	4	US-09-808-701A-25
51	99.5	1.6	600	4	US-09-252-991A-29817
52	99	1.6	915	1	US-08-328-322-5
53	98.5	1.6	801	4	US-09-351-150A-25
54	98.5	1.6	910	4	US-09-134-000C-4288
55	98.5	1.6	2152	3	US-09-036-987A-3
56	98.5	1.6	2152	3	US-09-370-700-3
57	98.5	1.6	2152	4	US-09-603-207-3
58	98	1.6	551	4	US-09-252-991A-24209
59	98	1.6	821	2	US-08-451-822A-13
60	98	1.6	821	4	US-08-323-430-13
61	97.5	1.5	660	4	US-09-252-991A-19282
62	97.5	1.5	769	1	US-08-471-570-8
63	97.5	1.5	1024	4	US-09-562-737-50
64	97.5	1.5	2680	4	US-09-489-039A-7973
65	97	1.5	537	1	US-08-173-508-2
66	97	1.5	537	2	US-08-265-310-2
67	97	1.5	537	3	US-08-951-742-2
68	97	1.5	1469	4	US-09-262-537-58
69	96.5	1.5	522	4	US-09-543-681A-5830
70	96.5	1.5	987	4	US-09-543-681A-7785
71	96	1.5	774	1	US-08-314-309A-21
72	95.5	1.5	3170	2	US-07-642-734C-5
73	95.5	1.5	3170	3	US-08-439-009A-5
74	94.5	1.5	500	4	US-09-071-035-396
75	94.5	1.5	817	4	US-09-489-039A-10407
76	94.5	1.5	1073	4	US-09-180-245-2
77	94.5	1.5	6095	3	US-09-144-085-2
78	94	1.5	550	4	US-09-328-352-5508
79	94	1.5	685	1	US-07-736-178C-2
80	94	1.5	2910	1	US-08-466-033-183
81	94	1.5	2910	2	US-08-444-733-183
82	94	1.5	2910	2	US-08-464-134-183
83	94	1.5	2910	2	US-08-461-361-183
84	94	1.5	2910	2	US-08-485-910-183
85	94	1.5	2910	5	PCT-US95-06286-157
86	93.5	1.5	389	4	US-09-596-824-2
87	93.5	1.5	544	4	US-09-198-452A-153
88	93.5	1.5	685	3	US-08-947-965-74
89	93.5	1.5	1536	3	US-09-413-814-10
90	93.5	1.5	3038	2	US-08-450-332-2
91	93.5	1.5	3038	3	US-08-637-640-2
92	93.5	1.5	3241	4	US-09-004-406C-2
93	93	1.5	1113	3	US-09-841-786-1
94	93	1.5	1113	3	US-09-629-616-3
95	93	1.5	1177	3	US-08-754-490-10
96	93	1.5	1177	3	US-08-754-490-12
97	93	1.5	1177	3	US-08-922-505A-10
98	93	1.5	1177	3	US-08-922-505A-12
99	93	1.5	1177	3	US-09-360-952A-10
100	93	1.5	1177	3	US-09-260-952A-12

ALIGNMENTS

RESULT 1

US-09-127-227-2
; Sequence 2, Application US/09127227
; Patent No. 639354
; GENERAL INFORMATION:
; APPLICANT: David M. Knipe
; APPLICANT: Travis J. Taylor
; APPLICANT: Elizabeth McNamee
; TITLE OF INVENTION: Replication-Competent Virus Expressing A
; TITLE OF INVENTION: Fusion Protein
; FILE REFERENCE: HU98-05
; CURRENT APPLICATION NUMBER: US/09/127,227
; CURRENT FILING DATE: 1998-07-31
; NUMBER OF SEQ ID NOS: 6
; SOFTWARE: PASTESEQ for Windows Version 3.0
; SEQ ID NO 2
; LENGTH: 1452
; TYPE: PRT
; ORGANISM: herpesvirus
US-09-127-227-2

Query Match 48.5%; Score 3054; DB 4; Length 1452;
Best Local Similarity 49.8%; Pred. No. 2.7e-304; Indels 48; Gaps 17;
Matches 609; Conservative 200; Mismatches 366;

QY	1	MENTQKTVT---VPTGLGYYV---ACRVEDLDLEEISFLAARSTDSLLPLMRNLTYE	55
DB	1	METPKTATTIKVPPGLGVYVARACPSEGL--LALLSARSGDADVAVAPLVVGLTVE	58
QY	56	KTFSSLAUVSGATTGLAGATIKLTTHSPYPSVFEVHGKHLPSAPNLTRACNA	115
DB	59	SGFEANVAVVGSRTTGLGTAVALSKLTPSHYSSSVTVFVGGRLDPSQAPNLTRUCR	118
QY	116	ARERFGSRCCGPPVDGAVETTGAEICTRLGLEPENTILYLVWALFKEAVFVNCFLHY	175
DB	119	ARRHFGSDYTPRGDLKHEITGALCERGLDPRALLYLVTEGFEKAVCINNTELHL	178
QY	176	GGDLVHINHGDVIRIPFPVQLFMDVNRVLPDPFTHRSIGEGFYVTPPYNTGLCH	235
DB	179	GGSKVTIGGAEVHRIPVYPLQLEMPDPFSVIAEFPFNANHRSIGENFTYPLPFNPLNR	238
QY	236	LIHDCVIAPMAVALVRNVAVARGAHLAFDENHEGVALPPDITYTYFOSSSGTTTAR	295
DB	239	LLFEAVGPAVALRCRNVDAVARAAHLAFDENHEGALPADITTFATFASQG--KTPR	296
QY	296	GARRNDVNSTKPSPSGGFERRLASIMAAADTALHAEVIPNTGIYEETPTDIKEWPMFIGM	355
DB	297	CGR-----DGGKGPAGGFEQRLASVMAGDAALAESIVSMAVDEPPTDISAMPLCEGQ	351
QY	356	EGTLPRNLALGSYTHARVAGVIGAMVFPNSALYTEVEDSGWTEAKDGGPGSPENREYQF	415
DB	352	DTAAARANAVGAYLARAAGLVGAMVFTNSALHTEVDVDDAGPADPKDHSK-PSYRFLV	410
QY	416	AGPHLAANPQTRDGHVL-----SSQSTGSSNTEFSVDYALICGFGAPLLARLLFYL	468
DB	411	PGTHVAANPOVDREGHVVGEGRTAPLVGGTQ-EFAGEHLMLCGFSPALLAKMLFYL	469
QY	469	ERCDAGFTGGHG-DALKYVTGTFDSETPCSICEKHTEPCVCAHTVHRLRORMPFCQAT	527
DB	470	ERCDGGVTVGROMDVFYVADNSCTDVCNLCFTDTEHACVHTTLMRLRARHHPKPSAA	529
QY	528	QPIGVGTGMSQXSDCPGLNAYPVLILRKFGDQTEAAKATMDTYRATILERFLIDLEQ	587
DB	530	RAIGVFGTMSMYSDCVLGNAYAFSAKX-ADGSETARIMQETYEAAETERVMAELET	588
QY	588	ERLDRGAPCSSEGLSSVVDHPTFRILDTLARIETQTFMKVLVETDYKIREGLS	647
DB	589	LQYVQAVPTANGRLTETITNREALHTVNVNRQVVDREVEQLARNLVGGRNFKFRDGLG	648

QY	648	EATHSMALTDPYSGAFCPITNPLVKRTHLAVVODLALSOCHCVFYGOQVEGRNFRNQF	707
DB	649	EANHAMSLTLDYACGCPCLLOLLGRSNLAVYODLALSOCHGVFAGSVEGRNFRNQF	708
QY	708	PVLRFRFVDFLNGGFISTRSTVTLSSEG-PVSAFNPTLQDAPAGRTFDGLARVSVEVI	766
DB	709	PVLRFRVDMFNNGFLSAKTLTVALSEGAATCAPSLTAGCTAPAESSEPGSVARVTLGFP	768
QY	767	RDIRVKNVFSGNTLSAARARLVGLASAYORQEKRVDMHLGALGFLKQFHGLLFP	826
DB	769	KELRVKSVLVFAGASANAASEAKARVASLQAYOKPKRVLDILLOPLGFLKQFHAALFP	828
QY	827	RCMPNKSQPNQPFWTLLQONQPADKLTHEEITTTAAVKRFTTEYAAINFINLPPTCI	886
DB	829	NGKPPGNSQPNQPFWTALQENQLPARLLSREDIETIAFKKFSLDYGAINFINLAPNV	888
QY	887	GELAQFYMANILKYCHSQVLYNLTISIICARRPRDPSSVLHWIRKDVTSAADETQA	946
DB	889	SELAHYMANQILRYCDSTYFINLTALIAAGSRPPSVQAAA--SAGGAGLEAGA	945
QY	947	KALLEKTENLPELWTTAFTSTHLVRAANQPMVVLGIGISIKYHGAAGNNRVFOAGNWSG	1006
DB	946	RALMDAVDAHGANWTSFASCNLLRPVWAARPMVVLGILSISKYGMAGNDRVFOAGNWS	1005
QY	1007	LNGGNVCPLFTFTRRPIIACPRGGFCPVTGSSGNRETLLSDQVRGIIVSGAMVQ	1066
DB	1006	LMGGKACPLITFTRKFLVACPRAGFVCAASNLGGGAHESSECEQLEGIISGGAAVA	1065
QY	1067	LAIYVTVAVCARAHMAFDWLSLTDDEFARLDELHDIQIOTLETPTWVEGAL---	1123
DB	1066	SSVFVATVKSUGFRYQQIOWDLALLEDEYLSSEEMELTAPALERGNGENSTDALEVA	1125
QY	1124	-BAVKILDEKTTAGDGETPTNLAFND--SCEPSSHDTTSNVNINISGNSISGTVGLKRP	1180
DB	1126	HEAEALVSLQNGAGE-----VFNFGDGCBE-----DDNATPPGPGGAPGAFAGKRA	1173
QY	1181	PEDDELFDLSGIPKXGNITNEM	1203
DB	1174	FGDDPPFG-EGPPDKKGDITLDM	1195

RESULT 2
US-08-807-332B-9
; Sequence 9, Application US/08807332B
; Patent No. 5959074
; GENERAL INFORMATION:
; APPLICANT: Dreyfus, David H.
; APPLICANT: Gelfand, Erwin W.
; TITLE OF INVENTION: PRODUCTS AND PROCESSES FOR REGULATION OF
; TITLE OF INVENTION: GENE RECOMBINATION
; NUMBER OF SEQUENCES: 32
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: Sheridan Ross
; STREET: 1700 Lincoln St., Suite 3500
; CITY: Denver
; STATE: CO
; COUNTRY: U.S.A.
; ZIP: 80203
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent In Release #1.0, Version #1.30
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/807,332B
; FILING DATE: 28-FEB-1997
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: Kovarik, Joseph E.
; REGISTRATION NUMBER: 33,005
; REFERENCE/DOCKET NUMBER: 2879-39
; TELECOMMUNICATION INFORMATION:

TELEPHONE: 303/863-9700
TELEFAX: 303/863-0223
INFORMATION FOR SEQ ID NO: 9:
SEQUENCE CHARACTERISTICS:
LENGTH: 35 amino acids
TYPE: amino acid
STRANDEDNESS:
TOPOLOGY: linear
MOLECULE TYPE: peptide
US-08-807-332B-9

Query Match 2.9%; Score 183; DB 2; Length 35;
Best Local Similarity 100.0%; Pred. No. 1.6e-11;
Matches 35; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 545 DPLGNYPYLILRKPGQTEAAKATMDTYRATLE 579
DB 1 DPLGNYPYLILRKPGQTEAAKATMDTYRATLE 35

RESULT 3
US-09-338-876-9
Sequence 9, Application US/09338876
Patent No. 6187584
GENERAL INFORMATION:
APPLICANT: Dreyfus, David H.
APPLICANT: Gelfand, Erwin W.
TITLE OF INVENTION: PRODUCTS AND PROCESSES FOR REGULATION OF
TITLE OF INVENTION: GENE RECOMBINATION
NUMBER OF SEQUENCES: 32
CORRESPONDENCE ADDRESS:
ADDRESSEE: Sheridan Ross
STREET: 1700 Lincoln St., Suite 3500
CITY: Denver
STATE: CO
COUNTRY: U.S.A.
ZIP: 80203
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patent in Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/09/338,876
FILING DATE:
CLASSIFICATION:
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 08/807,332
FILING DATE: 28-FEB-1997
ATTORNEY/AGENT INFORMATION:
NAME: Kovarik, Joseph E.
REGISTRATION NUMBER: 33,005
REFERENCE/DOCKET NUMBER: 2879-39
TELECOMMUNICATION INFORMATION:
TELEPHONE: 303/863-9700
TELEFAX: 303/863-0223
INFORMATION FOR SEQ ID NO: 9:
SEQUENCE CHARACTERISTICS:
LENGTH: 35 amino acids
TYPE: amino acid
STRANDEDNESS:
TOPOLOGY: linear
MOLECULE TYPE: peptide
US-09-338-876-9

Query Match 2.9%; Score 183; DB 3; Length 35;
Best Local Similarity 100.0%; Pred. No. 1.6e-11;
Matches 35; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 545 DPLGNYPYLILRKPGQTEAAKATMDTYRATLE 579
DB 1 DPLGNYPYLILRKPGQTEAAKATMDTYRATLE 35

RESULT 4
US-09-413-814-84
Sequence 84, Application US/09413814
Patent No. 6225064
GENERAL INFORMATION:
APPLICANT: Gesellschaft fuer Biotechnologische Forschung mbH
APPLICANT: Bristol-Myers Squibb, Co.
APPLICANT: Beyer, Stefan
APPLICANT: Bloeker, Helmut
APPLICANT: Brandt, Petra
APPLICANT: Cino, Paul M.
APPLICANT: Dougherty, Brian A.
APPLICANT: Goldberg, Steven L.
APPLICANT: Hofle, Gerhard
APPLICANT: Mueller, Joachim
APPLICANT: Reichenbach, Hans
TITLE OF INVENTION: DNA sequences for enzymatic synthesis of polyketide or
TITLE OF INVENTION: heteropolyketide compounds
FILE REFERENCE: PCT/US 99/23535
CURRENT APPLICATION NUMBER: US/09/413,814
CURRENT FILING DATE: 1999-10-07
EARLIER APPLICATION NUMBER: DE 198 46 493.2
EARLIER FILING DATE: 1998-10-09
NUMBER OF SEQ ID NOS: 107
SOFTWARE: Patent in Ver. 2.1
SEQ ID NO 84
LENGTH: 757
TYPE: PRT
ORGANISM: Sorangium cellulosum
US-09-413-814-84

Query Match 2.1%; Score 131; DB 3; Length 757;
Best Local Similarity 21.1%; Pred. No. 0.0012;
Matches 146; Conservative 84; Mismatches 251; Indels 212; Gaps 37;

QY 54 VKTFTSSLAVSGART---TGLAGGITLKTTHSHFVPSVVFHGGKHVLPSSAAPNL 109
DB 129 LERTLPVAVSIVADARAALTSAGVIVAS-----LPASAAA--- 167
QY 110 TRACNAARERFGSRGQPPVDGAVETTGAEICTRLGLEPENTILYLVVTFALFKEAVFMC 169
DB 168 ---AALQRLWATDGPSPGPISGPGA---ALRPESV--- 198
QY 170 NVFLHY-----GGLDIVHINHGDIPIPLFPVQLFMPDVNRLVPPDPNTHHSIGEGFY 224
DB 199 -AFLQYTSGSTGTFKGVMLTHGNL-----LHNSRLIAHGFDLTSPDPV-----GVIV 244
QY 225 PTFYNTGLC-----HLIHDCVIAPMAVALR-----VNVTVAV---ARGAAHLAFD--- 267
DB 245 LPYHDMGLIGLILQALYRIRVALMSPLSLQRPWRWLRVAVSALGASVSGGPNFAYDLC 304
QY 268 ---ENHEGAVLPDITYTYFQSSSGTTARGARDVNSTKSPSGGFERLASINA 323
DB 305 VRKSSEERAALD-----LRSEWVAFTCAEPVRAATLDRFARPAVSGFRRE--AFYP 355
QY 324 ADTALHAEVIFNTGIYEETPTDIKEWPMFIMGEGTLFRLNALGSVTARVAGVIGAMVF-- 381
DB 356 CYGLAEATLIVSGARAEAPV-----LARLAPEEVELGRAVASAAE--GARVFGV 403
QY 382 ---SPNSALYLTVEYEDSCWTEAKDGGGPGFENRYQFAGPHLA-----ANPQTRDGHV 432
DB 404 SGRALDPRA---VAIVDPAG---NEUGPG-EIGEIV-VSGSPVAVGVGRPE----- 447
QY 433 LSSQSTGSSNTEFSVDYLAICGFGAPLRLALLFYLERCDAGATGGHGDALKYVTGT-- 490
DB 448 -----ETEATFGATLAGSAAAP-----YLRTGDLGLFRGGE-----LFVVGRSK 486
QY 491 -----FDSEIFCSICEKH--TRPVC--AHTTVHRLRORM-----PRFGQATFQ 529
DB 487 DLILGRNHFQDIEKTVESHRVPGCSAFVSEHEGERLAVVCVSDPRVAADPRE 546
QY 530 FIGVFGTMSQYSDCDPLGNYPYLILRKPGQTEAAKATMDTYRATLERLIDLEQER 589

Db 547 IVAAREAVTAHQ-----LVAHVALIAPGALPKTSSGKVRRECRFALE-----DALGER 598
 QY 590 -----LLDRGAPCSSEGLSVIVDHPFRILDTLRARIEQTTQPMKVLVETRYKI 642
 Db 599 HVAFAPELLDDASPPDD---APPETEESGRLDALS-----TLARALRDLDAQIDAL 651
 QY 643 -----REG-SEATHSMALTTPDPVSGAFCTITNEL 671
 Db 652 PISRFGLSLAAVELQHAFAQVETGRAIPLTSIL 684

RESULT 5
 US-09-071-035-358
 ; Sequence 358, Application US/09071035
 ; Patent No. 6448043
 ; GENERAL INFORMATION:
 ; APPLICANT: Gil H. Choi
 ; TITLE OF INVENTION: Enterococcus faecalis Polynucleotides and Polypeptides
 ; NUMBER OF SEQUENCES: 496
 ; CORRESPONDENCE ADDRESS:
 ; ADDRESSEE: Human Genome Sciences, Inc.
 ; STREET: 9410 Key West Avenue
 ; CITY: Rockville
 ; STATE: Maryland
 ; COUNTRY: USA
 ; ZIP: 20850
 ; COMPUTER READABLE FORM:
 ; MEDIUM TYPE: Diskette, 3.50 inch, 1.4mb storage
 ; COMPUTER: HP Vectra 486/33
 ; OPERATING SYSTEM: MSDOS version 6.2
 ; SOFTWARE: ASCII Text
 ; CURRENT APPLICATION DATA:
 ; FILING DATE: US/09/071,035
 ; CLASSIFICATION:
 ; PRIOR APPLICATION DATA:
 ; APPLICATION NUMBER:
 ; FILING DATE:
 ; ATTORNEY/AGENT INFORMATION:
 ; NAME: A. Anders Brookes
 ; REGISTRATION NUMBER: 36,373
 ; REFERENCE/DOCKET NUMBER: PB36992
 ; TELECOMMUNICATION INFORMATION:
 ; TELEPHONE: (301) 309-8504
 ; TELEFAX: (301) 309-8512
 ; INFORMATION FOR SEQ ID NO: 358:
 ; SEQUENCE CHARACTERISTICS:
 ; LENGTH: 1074 amino acids
 ; TYPE: amino acid
 ; STRANDEDNESS: single
 ; TOPOLOGY: linear
 ; MOLECULE TYPE: protein
 ; US-09-071-035-358

Query Match 2.0%; Score 123; DB 4; Length 1074;
 Best Local Similarity 18.3%; Pred. No. 0.016;
 Matches 206; Conservative 150; Mismatches 415; Indels 352; Gaps 52;
 QY 250 ERYNTAVARGAHLAFDENHGAIVLPDITVTFQSSSSSTTTARGARRDNVNSTKPS 309
 Db 67 RTSLVAENYGAQTVC-IERGVSIPTEVHG------QKNPL 104
 QY 310 PSGGFERRLASIN--AADTALHAEIFNTGIYEE-----TPTDIKENPMFI 353
 Db 105 PMSOKAKLVSVLWEKAGTDIDTNVQAQMIWEENVGYKLHSIKRLGASVDIK-----158
 QY 354 GMEGLTPLRLNLSGTAR-----VAGVIG-AMVFPNSALYLTVEVDSGMTAKDGGP 405
 Db 159 STEGKINK--ALEEYQKPSFNTTVTKLQSTLLDKNELNLSEDFKVVQNTA-----211
 QY 406 GPSNRFYQAFPHLAANFQTRDRGHVLSQSTSSNTFSDVYALICGFGAPLARLL 465

Db 212 ----NIDVRVIGNQVLTP-----NSNSKSGTLLTKKSGAGTGP-VAYKK 251
 QY 466 FYLERCDAGAFGGHGDALKYVTGTFDFSEIPECSICEKHTRPVCAHTVHRLRQMRPFQ 525
 Db 252 AGLOITVAGALDKPNTYALKINVEIKGS-LKIKKIDSGDIVETVFLH-----DFGK 304
 QY 526 A-----TROPICVPGTWNQSYSDCDPLGNYA-----PYLLKPKGDOFAAKATM 570
 Db 305 ALPSKDVTTDKGI-----SILDGIPHGTVKITEKSVDPDPYIMDTTMAATIKAGETI 358
 QY 571 QDYRATLERLFDLEQERLLDRGAPCSSEGLS-----SVIVDHP-----FRRILDTLRA 621
 Db 359 SMTSKNRQKQILLEKGT-VETGTDLWNDNYSLAGNTFAIRKDSPAGEIVQBITDEKG 417
 QY 622 RIEQTTQPMKVLVETRYKIRELSSEATHSMALTTPD-----YSGAFPITNFIKRT 675
 Db 418 RAE--TPKELANALELGYVYTE--TKSSNGFVNTFKPTKVELKYANQTVALTVTSNKVQ 473
 QY 676 HLAUVQDLAL-----SQCHCVFVQGV-----EGNFRNQFOPVLRRRVDL 717
 Db 474 NOEITGETTLTKEDKDTGNSQGAEPKAGBYTLFTAKDQGAQVWSEAFK-----TEL 526
 QY 718 FNGGFISTRITVILSE--GPVSAENPTLQ-----DAPAGRTFDGLARVSE-----764
 Db 527 VKGTASDETVTTLALDEKNQAVKHLAINEFWQETKAPEGYTLDETKEYSVSIKVDNNE 586
 QY 765 ----VIRDIRVNRVW-----PSGNCNTNLSEAA-----PARLVGLASAYQROEKR 805
 Db 587 KNAVITRDVTAKEQVIRFGDFKFAAGSADCTAETGNDLSFKVSPLEGYKEITGAEDKA 646
 QY 806 VMLHGLGAP-----LLQFHGLLEPRGM-----PNSKS-----PNP 838
 Db 647 TTACNEQLGPDGYGFENLPYGYLLBEIEA---PEGFQKITPLEIRISTTKENKDDVAKS 703
 QY 839 QWFWTLLQNRQ-----MPADKLTHEEITIAAVERFTTEVAAINFINLP--PTCIGE 888
 Db 704 EYVFTITEEGOKQPIKVMVTVPEKLTNE-----FSVSLNRLMLYDLPEKEDSLTS 754
 QY 889 LAQFYMANLILKYCHSQYLINTLTSITGARRRDPSSVLHWIKD---VTSADITQ 945
 Db 755 LATWKGNGKLNLTDFTE-LVDKL-----RYNLHEIKEDWYVVAQIDVEA- 799
 QY 946 AKALLEKTENLPETWTTAFTST-----HLVRAAMNORPMVVLGISTISKYHGA 992
 Db 800 TKAQEKDEKAKPVVIAETATLANKEKTGTWKLHLKLTAEQ-----VLDKSVLNFVY 853
 QY 993 AGNRRVQAGNWSGLNGKNCVPLTFDRTRRPIACPRGFCIVTGPSSGNRETTLS 1052
 Db 854 YENKVAFEAGNE-----PVA-----KDALNN 875
 QY 1053 QVRGIIVSGGAMVOLAIYATVVRVAVGAR-----AQHMAFDDWLSLTDDEFLARDL-- 1102
 Db 876 QAQ-----TVNCIIEHVSIQTKAHLSDGSQTFHGDVMDMDDVSVTHDVL 923
 QY 1103 --SELHDOIOTLETPWVEGALEAVKILDE-----KITAGD-----GETPINLAFNFD 1149
 Db 924 SKSEAFETILYALLPDGTNKEIWSKIEHVNDEKFTKTVAEKVDTGKYPEGTEKTF- 982
 QY 1150 SCEPHSDTTSNV-----LMSGNSITSGTVGLKRPEDDE 1185
 Db 983 -TEINYKDGNGVNGKHEDLKEKSTLTTPKEVPTIPSTPKQPE 1024

RESULT 6
 US-09-071-035-394
 ; Sequence 394, Application US/09071035
 ; Patent No. 6448043
 ; GENERAL INFORMATION:
 ; APPLICANT: Gil H. Choi
 ; TITLE OF INVENTION: Enterococcus faecalis Polynucleotides and Polypeptides
 ; NUMBER OF SEQUENCES: 496
 ; CORRESPONDENCE ADDRESS:
 ; ADDRESSEE: Human Genome Sciences, Inc.

STREET: 9410 Key West Avenue
CITY: Rockville
STATE: Maryland
COUNTRY: USA
ZIP: 20850
COMPUTER READABLE FORM:
MEDIUM TYPE: Diskette, 3.50 inch, 1.4mb storage
COMPUTER: HP Vectra 486/33
OPERATING SYSTEM: MSDOS version 6.2
SOFTWARE: ASCII Text
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/09/071.035
FILING DATE:
CLASSIFICATION:
PRIOR APPLICATION DATA:
APPLICATION NUMBER:
FILING DATE:
ATTORNEY/AGENT INFORMATION:
NAME: A. Anders Brookes
REGISTRATION NUMBER: 36,373
REFERENCE/DOCKET NUMBER: PB369P2
TELECOMMUNICATION INFORMATION:
TELEPHONE: (301) 309-8504
TELEFAX: (301) 309-8512
INFORMATION FOR SEQ ID NO: 394:
SEQUENCE CHARACTERISTICS:
LENGTH: 1074 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: protein
US-09-071-035-394

Query Match 2.0%; Score 123; DB 4; Length 1074;
Best Local Similarity 18.3%; Pred. No. 0.016;
Matches 206; Conservative 150; Mismatches 415; Indels 352; Gaps 52;

QY 250 RVRNVTAVAGAAHLADENHEGAVLPDPITYTQQSSSGTTTARGARENDVNSKPS 309
DB 67 RTTSLYAEYNGAKQTVFC-IPEGVSIPTVTHGY-----QKNPL 104

QY 310 PSGGFERRLASIM--AADTALHAEVIFNTGIVE-----TPTDIKWPFI 353
DB 105 PMSDKAKVSVLWEKAGTDIDTNVQAQWIEVNGYKLSIKRLGGASVDIK-----158

QY 354 GMEGTLPRLNALGYTAR-----VAGVTG-AMVFPNSALYITEVEDSCGTEAKDGGP 405
DB 159 SIEGKINK--AIEYQKKPSFPHNTVTKILGQSTTLIDKLNLSSEFDKVVQNTA-----211

QY 406 GPSFNRRVQFAGPHLAANPQDRDGHVLSQSTGSSNTFSDVYALICGFGAPLLARLL 465
DB 212 ----NIDYRVIGNQVLVTP-----NSNSKSGTLTKKSAGTGP-VAYKK 251

QY 466 FYLERCDAGFTGGHGDALKYVOTFDSIPECSICEKHTRPVCAHTTVHLRQMRPFQ 525
DB 252 AGLQTVAGALDKNTVAIKINVTGKS-LKIKKIDKESGDIPTVFHL-----DFGK 304

QY 526 A-----TRQPIGVFTMNSQYSCDPLGNVA-----PYLLKPKGQDTEAAKATM 570
DB 305 ALPSKDVTTDKGI-----SILGIPHGKVTITEKSVDPDPYMDITPMAATIKAGETI 358

QY 571 QDTRATLERLIDLEERLIDRAGCSSEGLS-----SVIVDHTP---FRRLIDTLRA 621
DB 359 SMTSKNWRQKQILKXTG-VETGTDLWNDNYSLAGNTFAIRKDSPAGEIVQEIITDEKG 417

QY 622 RIBOTTQPMKVLVETRDYKIREGLSEATHSMALTFDP-----YSGAFCPITNFKVKT 675
DB 418 RAE--TPKELANALELGYTYVTE--TKSSNGFVNTFKPTKVELKYANQTVVALVTSNKGQ 473

QY 676 HLAVVQDLAL-----SOCHCVFYGOV-----EGNFRNQFQVRLRRFVDL 717
DB 474 NQBITGTTILTKEDXDTGNSQGAEPKGAETYLFTAKDQGAQVKNSEAFK-----TEL 526

QY 718 FNGGFISTRSITVTILSE-GPVSAFNPTLQ-----DAPAGRTFGDDLARVSVE-----764
DB 527 VKGTRASDETTLALDEKNQAVKHLAINFYWQSTKAPGEGYTLDETYPVSIKKVDNNE 586

QY 765 ----VIRDIRVKNRV-----PSGNCNLSSEA-----RARLYGLASAYORQEK 805
DB 587 KNAVITRDVTAKEQVIRFGDFPFKAGSADGTAETGFNDLSFKVPSLEGTXEITGAEDKA 646

QY 806 VDMLHGLGFG-----LLKQFHGLLFFPRGM-----PPNSKS-----PNP 838
DB 647 TTACNEQLGFGYGVKFPENLPYGDYLLLEIEA-----PEGFKITFLPFIIRSTFKENKDDYAKS 703

QY 839 QNFWTLLQBNQ-----MPADKLTHEIITIAAVKGFTEYYAAINFINLP--PTCIGE 888
DB 704 EYVFTITBEGQKQPIKMWTVPYEKLTNNE-----FSVSLNRLMLYDLPEKEDSLTS 754

QY 889 LAQFYMANLILKYCDHSOYLINTLTSIITGARPRDPSSVLHWIRKD---VTSAADIEFQ 945
DB 755 LATWKGNGKLNLTLPTE-LVDKL-----RYNLHEIKEDWVVAQAIDVEA- 799

QY 946 AKALLEKTENLPELWTTAFTST-----HLVRAAMNQRPMMVVLGISISKYGA 992
DB 800 TRAAQEKDEKAKPVVIAETATLANKEKTGTWKLHLKLTAEQ-----VLDRKSIVLFNV 853

QY 993 AGNNRVFQAGNWSGLNGKVCPLTFDTRRFFIACPRGGFCIPVTGPPSSGNRETTLS 1052
DB 854 YENKVAFEAGNE-----PVA-----KQASLNN 875

QY 1053 QVRGIIVSGGAMVQLAIYATVVAVGAR-----AQHMAFDDWLSLTDDEFLARDL--1102
DB 876 QAA-----TVNCTIERHVSIOQKAHLEDGSGTFTHGDVMDMPDDVSVTHDVL 923

QY 1103 ---EELHDQIIQLETPWTEGGALEAVKILDE-----KTTAGD-----GETPTNLAFPD 1149
DB 924 GSKEAFETILYALLPGTNKEIWKSGKIEHVNDEKFTKVLAEKVDTGKYEGTKFTF- 982

QY 1150 SCEPSSHDTTSNY-----LNISGNSIGSTVPGKLRPPEDDE 1185
DB 983 -TEINVEKDGNGVNGKHNEDLKEKSQTLTPKEVPTTIPSTPKQPE 1024

RESULT 7
US-09-134-000C-5764
Sequence 5764, Application US/09134000C
Patent No. 6617156
GENERAL INFORMATION:
APPLICANT: Lynn Doucette-Stamm et al
TITLE OF INVENTION: NUCLEIC ACID AND AMINO ACID SEQUENCES RELATING TO
FILE OF INVENTION: ENTEROCOCCUS FAECALIS FOR DIAGNOSTICS AND THERAPEUTICS
FILE REFERENCE: 032796-032
CURRENT APPLICATION NUMBER: US/09/134,000C
CURRENT FILING DATE: 1998-08-13
PRIOR APPLICATION NUMBER: US 60/055,778
PRIOR FILING DATE: 1997-08-15
NUMBER OF SEQ ID NOS: 6812
SOFTWARE: PatentIn version 3.1
SEQ ID NO 5764
LENGTH: 1096
TYPE: PRT
ORGANISM: Enterococcus faecalis
US-09-134-000C-5764

Query Match 1.9%; Score 122; DB 4; Length 1096;
Best Local Similarity 18.5%; Pred. No. 0.02;
Matches 208; Conservative 149; Mismatches 410; Indels 360; Gaps 53;

QY 250 RVRNVTAVAGAAHLADENHEGAVLPDPITYTQQSSSGTTTARGARENDVNSKPS 309
DB 89 RTTSLYAEYNGAKQTVFC-IPEGVSIPTVTHGY-----QKNPL 126

QY 310 PSGGFERRLASIM--AADTALHAEVIFNTGIVE-----TPTDIKWPFI 353
DB 127 PMSDKAKVSVLWEKAGTDIDTNVQAQWIEVNGYKLSIKRLGGASVDIK-----180

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354 GMEGTLPRNALGSYAR-----YAGVIG-AMVSPNSALYLTEVDSGMTAKDGP 405
Db 181 SIEKINK--AIEYQKPSFHTVTKILQGSTTLIDKMLNSLDFKVVQNTA----- 233
Qy 406 GPSFNREYQFAGPLAANPOTDRDGHVLSQSSQSSNTSFSDYLALICGAPLALRL 465
Db 234 ----NIDYRIGNQLVTP-----NSNSKSGTLTKKSAGTGP-VAYKK 273
Qy 466 FYLERCDAGFTGGHGDALXKVGTGPDSEIPCSL-----CEKTRPVCAHTVHRLRQRP 521
Db 274 AGLOTVMAGALDKPNTVAIK-----IDVETKSLKIKDKESGDIVPETVFLH----- 322
Qy 522 RFQQA-----TROPIGVFGTMNSQVSDCDPLGNYA-----PYLILRKPQDTEAA 566
Db 323 DFGKALPSKDVTDKQI-----SILDGPHGTVKVIITEKSVDPDMIDTTPMAATIK 376
Qy 567 KATMQDYATRLERLFDLQERLLDRGAPCSSEGLS-----SVIVDHT-----FRILD 617
Db 377 GETISMTSKNRQKQILLEKTG-VETGTDLMNDYSLAGNTFAIRKDSPAGEIVQEIIT 435
Qy 618 TLARIEQTTQFMKVLVETRDYKIRGLSEATHSMALTEDP-----YSGAPCPIITN 671
Db 436 DEGRAB--TPKELANALELGTIVTE--TKSNGFVNTFKPKVBLKYANQTVALTNS 491
Qy 672 VKRTHLAVQDLAL-----SOCHCVFYQQV-----EGRNFRNQFPVLR 713
Db 492 VKGQNEITGETTLTKEDKDTGNEQKAEFKGAETLFTAKDQVAKWSEAFK----- 545
Qy 714 FVDLFNGGFTSTSIITVLS-SPVSAPNPTLQ-----DAPAGTFFCDLARVSE-- 764
Db 546 -TELKGTASDETVTLALDEKQVAVKHLAINEYFWQETKAPGTYLDETKYFVSICKV 604
Qy 765 -VRDRVRKRVV-----PSGNTNLSEAA-----RARLVGLASAYOR 801
Db 605 DNNEKNAVITRDYAKEQVIRFGDFPKFAGSADGTAEIGFNDLSFKVSPLECTNEITGA 664
Qy 802 QEKRVMLHGALG-----LLKQFHGLLFRPGM-----PPNSKS----- 835
Db 665 EDKATTACNEQLGDFGKGFENLPYGDYLLEIEA--PEGFKITPLEIRSTFKENKDD 721
Qy 836 -PNQWFWTLQRNO-----MPADKLTHEIITIAAVKRTPEYAAINFNLB-FT 884
Db 722 YAKSEYFTITEGQKQPIKQWTVPEKLTNN-----FVSINRLMLYDLPEKED 772
Qy 885 CIGELAQFYMANLILKYCHDSQYLINTLTSITGARRPRDPSSVLHWIKD---VTSAD 941
Db 773 SLTSLATWKDGNKKNLDFTE-LVDKL-----RYNLHEIKEDWTVVAQAID 818
Qy 942 IETQAKALLEKTNLPELWTAFTST-----HLVFAAMNQRPWVLGSLISK 988
Db 819 VEA-TKAAQSEKDEKAPVVAETATLANKEKGTWKILHKLTAEQ-----VLDKSI 871
Qy 989 YHGAAGNNRVFQAGNWSGLNGKNCVPLFTFDRTRRPIIACPRGGFICPVTPGSSGNRET 1048
Db 872 FNYVYENKVAFEAGNE-----PVA-----KDA 893
Qy 1049 TLDQVRGIVSGGAMVQLAIYATVRAVAR-----AQHMAFDWLSLTDDEFLAR 1100
Db 894 SLANNQAO-----TVNCTIERHVSIOTKAHLDESGQTFTHGVDNMDFDVSVTH 941
Qy 1101 DL-----BELHDOIOTLETPTWVEGALEAVKILDE-----KTTAGD-----GETTNLA 1145
Db 942 DVLDSKEAETILYALLPDGTNKEIWKSGKIBHEVNDKFTKTVLAEKVDTGKPEGYK 1001
Qy 1146 FNFQSCPSHDTNSV-----LNISGNSISGTVPLKRPPEDE 1185
Db 1002 FTF--TEINYEKQGNVNGKHNEDLKESQTLTPKEVPTIPSTPKQPE 1046

```

RESULT 8

US-09-252-991A-16913
; Sequence 16913, Application US/09252991A

RESULT 9

US-09-489-039A-12681
; Sequence 12681, Application US/09489039A

Patent No. 6610836

GENERAL INFORMATION:

APPLICANT: Gary Breton et. al

TITLE OF INVENTION: NUCLEIC ACID AND AMINO ACID SEQUENCES RELATING TO KLEBSIELLA

FILE OF INVENTION: PNEUMONIAE FOR DIAGNOSTICS AND THERAPEUTICS

FILE REFERENCE: 2709.2004001

CURRENT APPLICATION NUMBER: US/09/489,039A

CURRENT FILING DATE: 2000-01-27

PRIOR APPLICATION NUMBER: US 60/117,747

PRIOR FILING DATE: 1999-01-29

NUMBER OF SEQ ID NOS: 14342

SEQ ID NO 12681

LENGTH: 855

TYPE: PRT

Patent No. 6551795

GENERAL INFORMATION:

APPLICANT: Marc J. Rubenfield et al.

TITLE OF INVENTION: NUCLEIC ACID AND AMINO ACID SEQUENCES RELATING TO PSEUDOMONAS

FILE OF INVENTION: AERUGINOSA FOR DIAGNOSTICS AND THERAPEUTICS

FILE REFERENCE: 107196.136

CURRENT APPLICATION NUMBER: US/09/252,991A

CURRENT FILING DATE: 1999-02-18

PRIOR APPLICATION NUMBER: US 60/074,788

PRIOR FILING DATE: 1998-02-18

PRIOR APPLICATION NUMBER: US 60/094,190

PRIOR FILING DATE: 1998-07-27

NUMBER OF SEQ ID NOS: 33142

SEQ ID NO 16913

LENGTH: 370

TYPE: PRT

ORGANISM: Pseudomonas aeruginosa

US-09-252-991A-16913

Query Match 1.9%; Score 118.5; DB 4; Length 370;
Best Local Similarity 20.2%; Pred. No. 0.0061;

Matches 93; Conservative 46; Mismatches 137; Indels 185; Gaps 19;

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Qy 208 PDFFNTHRSIGEGFVYPTFPYNTGLCHLHDCVIAPMAVALRVNVTAVAGAAHLAFD 267
Db 17 PDPCNAYH-----TDEQWAAVLTRD 37
Qy 268 ENHEGA-VLPPDITVYFQSSSGTTTARGARRNDVN--STSKPSPSGGF-----ER 316
Db 38 AADGAFVYAVKTCVYCRPSSS---ARRPRRENVEFFATAEAAAGYRPSRAAGDR 93
Qy 317 RLASIMAADTALHAEVFNPTGIEETPTDIKEMFNFGME-----GTLPLRNA 364
Db 94 RLAAEQRAERVAQACRMETIA---ETPPALEAALRLGSPFHFRLFKAETGLTPKAYA 150
Qy 365 LGSYTVARVAGVIGAMVSPNSALYLTEVDSGMTAKDGGPGSPFNRFYQFAGPLAANP 424
Db 151 SAYRARRURELQASASVTEAIY-----DSGFN-----SNSRFYESSQRLGWRP 196
Qy 425 QTRDRGHVLSQSSQSSNTSFSDYLALICGFGAPLARLLFYLERCDAGFTGGHGDAL 484
Db 197 RYRDRG-----GAG-----AAIRFAICQCSLGAI-----220
Qy 485 KYVTGTFDSEIPCSICEKHTRPVCA-----HTTVHRLRQMRP-----FGQATR 528
Db 221 -----LVAQSQGICAILLGEPEPELRLRELQDQFPRAQLLGGDADFERLVA 266
Qy 529 QPIGVFGTMNSQVSDCDPLGNYPYILIRKPDQDTEAAKATMQ-----DTYRATLERLF 582
Db 267 QWVG-----FVESPOLGLDLP-LDVRGTAFOERYWQALRETPPGSTASYAQIAERI- 316
Qy 583 IDLEQERLLDRGAP-----CSSEGLSSVIVDHTFTR 614
Db 317 -----GAPRAVRAVAQAACAAANRIAVAPICHRVYR 346

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; ORGANISM: Klebsiella pneumoniae
 US-09-489-039A-12681
 Query Match 1.9%; Score 117; DB 4; Length 855;
 Best Local Similarity 21.8%; Pred. No. 0.042;
 Matches 107; Conservative 54; Mismatches 140; Indels 190; Gaps 29;

QY	320	SIMA-----ADALHA	VFNTGTYIBETPTD	IKIEWPWF	IGMETGL	PRLNALG	SVTVARVAG	374
DB	240	SIMAFG	NDYTDSSFG	LSFN-GI--	KLADERW	WFO--GKG	GYAPEVHG	VASSARV--
QY	375	VIGAMV	SPNSALYL	TEVDSG	MTAKDGG	PGP-----	SFNR	FYQ-----
DB	293	----	VIKQLG	KVIVET	HTVP-----	PGPFY	IDLNYR	YQGLQVKV
QY	415	-PAG	HLAAN	QTD	RDG-----	----	HVLS	SQSTGSSN
DB	338	RFTVPY	-SAV	DSVR	PGNHW	YAFALG	KVROY	YIDNR
QY	447	VDYAL	ICG	GAP	LLARLL	FYLER	CDAGAF-----	TGG-----
DB	397	HDYQ	AWLA--	-GGV	LATRL-----	----	GAFGM	NATWSGAQ
QY	493	-----	ALKY	TGTF	-DSEI	PCSL-CEKH	TPYCAHT	VHRLR
DB	446	STG	NVLAA	YRYSTG	FRDLED	VFGV	QOEHSI	VYISD
QY	532	GVG	GTMSQ	YD	CDPL	GNYP-----	----	YLI
DB	502	GRLG	TNL	LSAST	ADYV	YNNRS	KITQL	QGYSN
QY	559	PDQ	TEA	AKAT	QD	TYR	ATLER	LP-----
DB	562	PDQ	LN	QRO	KYIT--	ETTL	SFTLS	IPEN
QY	602	LS-	SVIV	DHPT	FRR-----	ILDT	KARIE	QTTQ
DB	620	LSW	SVY	GGYD	RYR	NGDE	GTAT	TFG
QY	651	HS	MLT	FD	PYS	661		
DB	679	HS	GV	T	FG	YA	689	

RESULT 10
 US-09-091-609-2
 ; Sequence 2, Application US/09091609
 ; Patent No. 6600029
 ; GENERAL INFORMATION:
 ; APPLICANT: SHERMAN, DAVID H.
 ; APPLICANT: WILLIAMS, MARK D.
 ; APPLICANT: XUE, YONGQUAN
 ; TITLE OF INVENTION: METABOLIC ENGINEERING OF
 ; TITLE OF INVENTION: POLYHYDROXYALKANATE MONOMER SYNTHASES
 ; FILE REFERENCE: 600.297US2
 ; CURRENT APPLICATION NUMBER: US/09/091.609
 ; CURRENT FILING DATE: 1998-06-19
 ; EARLIER APPLICATION NUMBER: PCT/US96/20119
 ; EARLIER FILING DATE: 1996-12-18
 ; EARLIER APPLICATION NUMBER: 60/008.847
 ; EARLIER FILING DATE: 1995-12-19
 ; NUMBER OF SEQ ID NOS: 4
 ; SOFTWARE: FASTSEQ for Windows Version 3.0
 ; SEQ ID NO 2
 ; LENGTH: 4630
 ; TYPE: PRT
 ; ORGANISM: Streptomyces venezuelae
 US-09-091-609-2

Query Match 1.8%; Score 111; DB 4; Length 4630;
 Best Local Similarity 19.7%; Pred. No. 4.2;
 Matches 250; Conservative 109; Mismatches 419; Indels 494; Gaps 66;

Qy	51	NLTVEKTFSSSLAVV-----SGARTTGLAGAGITLKLTTSHFVPSVFPVHGKHVLP	102
Db	166	SLTVDAQSSSLVAVHLACESLPAGSTTALV-AGVNL-----NILA	206
Qy	103	SSAAPNLTRACNAARERFGFSRCQGPFPVDAVETTGAEICTRIGLEPENTILYLVVTFALF	162
Db	207	ESA-----VTEERFG-----GLSPDGTAYTFDARA--	231
Qy	163	KEAVFMCNVLHYGGLDIYVHNHGDVIRPLFPVOLFMPDVNELVDPDPFNTHRSIGEGF	222
Db	232	-----NGFVRGEG-----GGVVVLKPL-----SALADGDRVH-----GV	261
Qy	223	VYTPFYNTGLCHLHDCVIAPIAVALVRNVTVAVARGAAHLAFDENHGAFLPPDITYT	282
Db	262	IRASAVNNDG-----AIFGLTVPSRAAQEKVLYREAYRKAALDPS-AVQ	303
Qy	283	YFOSSSGTTTARGARRNDVNSTKSPSGGFFERLASIMAAATALHAEVIFNTGIYEET	342
Db	304	YVELHGTGT-----PVGDPTEAALGAVILGSARPADPEL-----LVGSA	342
Qy	343	PTDIKEWPMFIMEGTLPRLNALGSVTVARVAGVIGAMVFPNSALYLTEVEDSGMTEAKD	402
Db	343	KINVGHLEGAAGIVGLIKTLLALG--RRRIPASINFTPHDPDLP-----DILGLDVPD	394
Qy	403	GGPGPSFNRFYCPAGPHLAANPOTDRD-----GHVLSQSQTSGSNNTFESVD	448
Db	395	G-----LREWPHDPRELLAGVSSFGMGGTNAHWLISEGPAQGEQGPID	438
Qy	449	YLALICGFGAPILARLLFYLERCDAGA-----FTGGHGDAK-----YVTGTFDSBI-P	496
Db	439	EETPV-----DSGAALPVVVTGRGGEALRAQARLHBAVEADPELAP	480
Qy	497	CSLCEK--HTRPVCAHTTV-----HRLRQRMRFQOATRPQIVGFTGMNSQYSDCDPLG	548
Db	481	AALARSILVTRTVFTHRSVVVLAPDRARLLDGLCALAAGTPAGPVWTGT-----	528
Qy	549	NYAPYLILKPGDQTEAAKATMODTVRATLERLFIIDLEQLDRGNAPCSSEGSLSSVVD	608
Db	529	-----PAPG-----RLAVLF-----SQGAQRTGMGM-ELUYAA	555
Qy	609	HPTRFRILDTLARIIBQTTQFMKVLVETRD-----YKIREGLSEATHSNALT	656
Db	556	HPAFATAFDAVAELDFLLDRPLAELVAAGDTLDRTVHTQPALFAVEVALHRLVESNGVT	615
Qy	657	FDPSYGAFCPTNPLVKRTHLAVQDIALSQCHCVYGOQVEGRNFNQPVLRFRFVD	716
Db	616	PDLLAGH-----SVGEISAAHVAGV--LSLRDA-----ARLVAARGRLMQALP-----	656
Qy	717	LFNGGSTRISITVTISEGVPVSNPTLIGQDAPAGRTFDGDLARVSVEVIRDIRVKNRVV	776
Db	657	--EGGM-----VAVEASEBEVL--PHL-----AGRERELSLAENV-----GPRAVV	694
Qy	777	FSGCTNLSGAAPARILVGLASAYQREKRVMDLHGALFLLKQFHGLLF-----	825
Db	695	LAG-----ABRAVLDAELLREQRRTKRLSVSHA-----FHSPLEMPMLDDFRVV	741
Qy	826	-----PR-----GWPEPNSKSNPW-----FWTLLOQNMQPADKLTHEEITTAAV	866
Db	742	EELDFOEPRVDVVSVTVTGUFVTA-----GQWTDPEYW-----VDQV-RRPVRFUDAV	787
Qy	867	KRTEVYAAINFINLPP--TCIGELAQFYMANLILKYCDHSQYLINTLSIITIGARRPRD	924
Db	788	-RTLEESGADTFLELPGDGVCSAMAADSV-----RDQEAATAVSALRXG--RP-E	833
Qy	925	PSVILHWIKDVTSAADIEFQAKALLEKTENLPELWTTAFTSTHLVRAAMNQPMVLGI	984
Db	834	POSLLAALTTFVVRGHVD-----WTAHGSTGTVRVPL-----PTYAFQR	874
Qy	985	SISKYHGAAGNNRVFOAGNWSGLNGKNVCPLFTFDRTRRFIACPRGGICPTVGPSSG	1044
Db	875	ERWFQGAARTAPLTAQR-SGTGAG-----TGPAG	905
Qy	1045	-----NRETTLSQVREGIIVSGGAMVOLAIYATVTRA-VGARA	1081

Db 906 VTSGEGEGEGAGAGGDRPARHETT--ERVRAHVA--VLEDDPTFVELGLTF 957
Qy 1082 QHMAFDWLS-----LTDDEFLARLDEELHDQIIQTLETPMTVEGALBAVKILDEKTTA 1135
Db 958 KELGFDLSMSVELRNALVDDTGLRPSGLLFDH-----PTP-----RALAA--HLGDLITG 1006
Qy 1136 GDGETPTNLAFNDSCEPS--HDTTSNVLNLSGNSISGTVPGKRPPEDELFDL---- 1189
Db 1007 GSGETG-----SADGIPPATPADTTAEPIAIG--MACRYPGGVTSPEDE--LWLVAEG 1056
Qy 1190 -----SGIPIKKG 1197
Db 1057 RDAVSGLPTRDG 1068

RESULT 11
US-09-105-537-2
; Sequence 2, Application US/09105537A
; Patent No. 6265202
; GENERAL INFORMATION:
; APPLICANT: Sherman, D.H.
; APPLICANT: Liu, H.
; APPLICANT: Xue, Y.
; APPLICANT: Zhao, L.
; TITLE OF INVENTION: DNA encoding methymycin and pikromycin
; FILE REFERENCE: 600.438US1
; CURRENT APPLICATION NUMBER: US/09/105.537A
; CURRENT FILING DATE: 1998-06-26
; NUMBER OF SEQ ID NOS: 43
; SOFTWARE: FastSeq for Windows Version 3.0
; SEQ ID NO 2
; LENGTH: 5215
; TYPE: PRT
; ORGANISM: Streptomyces venezuelae
US-09-105-537-2

Query Match 1.8%; Score 111; DB 3; Length 5215;
Best Local Similarity 19.7%; Pred. No. 5.2;
Matches 250; Conservative 109; Mismatches 419; Indels 494; Gaps 66;

Qy 51 NLTVKFTTSSLAUV-----SGAETTLGAGITLKLTTSHFVPSVFVHGKHVLP 102
Db 166 SLTVDAQSSSLVAHVLAHACSLRAGESSTALV-AGVNL-----NILA 206
Qy 103 SSAAPNLTRACNARERFGSRCPGPDGAVETTGAEICTRLGLEPENTILYLVVTFALF 162
Db 207 ESA-----VTEERFG-----GLSPDGTATYFDARA-- 231
Qy 163 KEAVFMGNVFLHYGGLDIVHINHGDVIRIPLFPVOLPMPDNLVPPDPFNTHRSIGEGF 222
Db 232 -----NGFVRGEG-----GGVVVLKPL-----SRALADGDRVH-----GV 261
Qy 223 VYPTPFYNTGLCHLHDCVIAFMAVALVRNVTAVARGAAHLAFDENHEGAVLPDDITYT 282
Db 262 IRASAVNNDG-----ATPGLTVPSRAAQEKVLRAYRKAALDPS-AVQ 303
Qy 283 YFQSSSSGTTTARGARRDNVNSTKSPSGGFERRLASIMAADTALHAEVIFNTGYYEET 342
Db 304 YVELHGIGT-----PVCDEIAAALGAVLGSARPADEPL-----LVGSA 342
Qy 343 PTDIKENPMFTGMBGTLPRLNALGSYARVAGVIGAMVFPNSALYLTVEVDSGTEAKD 402
Db 343 KTNVHLEGAAGIYGLIKTLALG--RRRIPASLNFTPHDIPL-----DTLGLDVPD 394
Qy 403 GGPGPSFNRFQFAGPHLAANPQTRD-----GHVLSQSGTSSNTEFSVD 448
Db 395 G-----LREWPHDPDRELLAGVSSFGMGNGTNAHVVLSEGPAAQCGEQPID 438
Qy 449 YLALICGFGAPLLARLLPYLERCDAGA-----FTGGHGDALK-----YVTGTFDSEI-P 496
Db 439 BETPV-----DSGAALPFVVTGCGEALRAQARELHAVEADPELAP 480

Qy 437 CSLCEK--HTRPVCATTV-----HLRQMRPFQGATRQPIGVFGTMSQYSDCDPLG 548
Db 491 AALARSIVTITVTHRSVVLAPDRARLLDGLGALAAGTAPGVVTGT----- 528
Qy 549 NYAPYLILRKFGDQTEAAKATMQDTYRATLERFLIDLEQERLLDRGAPCSSEGLSSVVD 608
Db 529 -----PAPG-----RLAVLP-----SQGAQRTGGM-ELYAA 555
Qy 609 HPTFRILDTLRARIEQTTTQPMKVIYETRD-----YKIREGLSEATHSMALT 656
Db 556 HPATATAPDAVAEELDLLDRPLAELVAAGTDLRTVHTQPALFAVEVALHRLVESGVT 615
Qy 657 FDPYSGAPCPIITNLFVZKTHLAVVQDLALSOCHQVFGVQQVQVEGRNFRNQFVLRRRFPVD 716
Db 616 PLLAGH-----SVGEISAAHVAGV--LSLRDA-----ARLVAARGRLMQALP----- 656
Qy 717 LFNGGFISTRISITVTLSEGPVSAENPTLQDAPAGRTFDGLARVSEVETDIRVQRV 776
Db 657 --EGGAM-----VAVEASEEEVL--PHL-----AGRERELAAVN-----GPAW 694
Qy 777 FSGNCTNLSEARARLVGLASAYORQEKRVDMHAGLGLLKQPHGLLP----- 825
Db 695 LAG-----AERAVLDVAELLREQRRYKRLSVSHA-----FHSPLMEPLDFFRVV 741
Qy 826 -----PR-----GMPENSKSPNPQW-----FWTLQONQMPADKLTHEIRITTA 866
Db 742 EELDFQEPVVDVWSTVGLPVTA---GQWTDPEYV-----VDQV-RRPVRFDAV 787
Qy 867 KFTTEYAAINFILPP--TCIGELAQFYMANLILKYCHSOYLINTLTSIITGARPRD 924
Db 788 -RTLEESGADTFLELPGDPGVCMAADSV-----RDQEAATAVSALRKG--RP-E 833
Qy 925 PSSVLHWIRKDVTSAADETQAKALLEKTENLPELWTTAFTSTHLVRAAMNQRPMVLGI 984
Db 834 QSLLAALTTVVRGHVD-----WTAAGSTGTVRVPL--PTYAFOR 874
Qy 985 SISKTHGAAGNRVFOAGNWSLNGCKVCPFLFEDTRRFLIACPRGFCPTGSSG 1044
Db 875 ERHNPFGAARTAAPLTAGR-SGTGAG-----TGPAAG 905
Qy 1045 -----NRETTLSQVGIIVSGGAMVQIAIYATVVRA-VGARA 1081
Db 906 VTSGEGEGEAGAGGAGGDRPARHETT--ERVRAHVA--VLEDDPTFVELGLTF 957
Qy 1082 QHMAFDWLS-----LTDDEFLARLDEELHDQIIQTLETPMTVEGALBAVKILDEKTTA 1135
Db 958 KELGFDLSMSVELRNALVDDTGLRPSGLLFDH-----PTP-----RALAA--HLGDLITG 1006
Qy 1136 GDGETPTNLAFNDSCEPS--HDTTSNVLNLSGNSISGTVPGKRPPEDELFDL---- 1189
Db 1007 GSGETG-----SADGIPPATPADTTAEPIAIG--MACRYPGGVTSPEDE--LWLVAEG 1056
Qy 1190 -----SGIPIKKG 1197
Db 1057 RDAVSGLPTRDG 1068

RESULT 12
US-09-543-681A-6059
; Sequence 6059, Application US/09543681A
; Patent No. 6605709
; GENERAL INFORMATION:
; APPLICANT: GARY BRETON
; TITLE OF INVENTION: NUCLEIC ACID AND AMINO ACID SEQUENCES RELATING TO PROTEUS MIRABILIS
; FILE REFERENCE: 2709.1002-001
; CURRENT APPLICATION NUMBER: US/09/543.681A
; CURRENT FILING DATE: 2000-04-05
; PRIOR APPLICATION NUMBER: US 60/128,706
; PRIOR FILING DATE: 1999-04-09
; NUMBER OF SEQ ID NOS: 8344
; SEQ ID NO 6059
; LENGTH: 790

TYPE: PRT
ORGANISM: Proteus mirabilis
US-09-543-681A-6059

Query Match 1.7%; Score 110; DB 4; Length 790;

Best Local Similarity 19.1%; Pred. No. 0.19; Indels 250; Gaps 42;
Matches 171; Conservative 124; Mismatches 350;

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QY 350 PMFIMGELT-----PRNLALGSYTVARVAGVIGAMVFSN 384
DB 34 PLFVGRKSHCLEAAMNDKQIMLVAKQDASTDEFGVNDLFS-VGTVASVLQMLKLPDG 92
QY 385 SALYLTE-VEDSGMTEAKDGGPSPNFRFYQFAGPHLAANPQTDROGHVLSSTGSSNT 443
DB 93 TVKVLVEGIRRAKITTLSDNG-----EYFQAKAEYLDTPVVDEREQEVNLR---TAIN 142
QY 444 EPSVDYLALICGFGAPLLARLLFLYERCDAGAFGGH-----GDALKY 486
DB 143 QFE-GYIKLNKKTPPEVLASHAIESAKLADTASHMPLKDKQAVLEMSDVTERLEY 201
QY 487 VTGTFDSEIPCSLCEKTRVCAHTTVHRLRQMR-----FGQATROPIGVFGTMNQ 540
DB 202 LMAWMESEIDLLQVEKRIR-----NRVKQWKSQREYVYLNQWKAQKELGEMDDA 253
QY 541 YSCDPLGNVAPYLLIRKPGDQTEAAKATQD-----TYRATLERFLTDLEQERLLDR 593
DB 254 PDEMESLKRKIB--AAKMPKEAREKTEAELOKLMSPWSEATVVRYSYIDMWVQ----- 306
QY 594 GAPCSSEGLSSVVDHPTFRRIIDTLARIEQTTFPMKVL-VETRDYKIREGLSEATHS 652
DB 307 -VPWNSR--SKVKDLVKAQEVLDTDHYGLERKVERILEVLAQVRSVKIKGPI----- 357
QY 653 MALTFDPSG-----AFCSITPLVGRTHLAVVQDLALSQCCHCVFGQOVBGRFNQF 706
DB 358 LCLVGPFGVGTSLSGQIAKATGRKYRMALGGVRDEA-----EIRGH----- 400
QY 707 QPVLRREFVDLFNGGFTSTRSITVTLSEGPVSPAPNPTLGQDAPAGRTFD--GGLARVSV 764
DB 401 -----RRYVIGSMPEKLIKQMA-----KVGKNPLFLDDEIDKQSSDMGEPAGALL 448
QY 765 VI-----RDIRVKNR-----VFGNCTNISEAA-----RARLVGLASAYQRQKRV 807
DB 449 VLDPEQNIADFNDHYLEDVYDLSDFVAVATSNMNIAPALDRMEVIRL-SGYTEDEK--- 504
QY 808 MLHGALGFL--KQFEGHLLFRGMPNPSKSPNQFWTLLOQNOMPADKLTHESITIAAV 866
DB 505 -LNTAKOHLFPQ-----IERNALKENELTIHDSAIMGII 538
QY 867 KRFTVEEVAANFI--NLPPCTCIGELAQFYMANLILKYCDHSQYLINTLTSIITGARRPD 924
DB 539 RYVYTR-AGVRESLEISKLRKAVKQLMDSTI-----KHIEDENNLKDYL-GVRK--- 589
QY 925 PSSVLHWIRKD-----VTSAADIEQAKALLEKTENLPDLWTAPT-STHLVRAAMNQ 976
DB 590 ---VDYGRADTENRIGMVTGLAWTEVGGDLITITASVPKGKLTFTGSLGEVWQESI 645
QY 977 RPYVVLGTSISKYHGAAGNRFVQAGNSGLNGKNCPLFTFTRFRFIIACPRGGFIC 1036
DB 646 AAMTVVRARADKL-----GNG-----DFYEKDIHVHVEGA--T 679
QY 1037 PVTGPSSGNRETT-----LSDQVRGIVSGAMVQIAIYATVVRVARGAR-----AQHMAP 1086
DB 680 PKGPFAGIAMCTALVSSLTGNPVRSDVAMTG---EITLRQVLPFIGLKEKLIAAHRGG 736
QY 1087 DDWLSLTDDFLARDLELHQIICLTETPTVVEGALEAVKILDEKTTAGDETP 1141
DB 737 IKTVLIPDN--KRDLSEIPEINIVADLD-----IHPVKTIEVLTLALEKSP 781

```

RESULT 13
US-07-642-734C-4
Sequence 4, Application US/07642734C
Patent No. 5824513

GENERAL INFORMATION:
APPLICANT: Katz, L
APPLICANT: Donadio, S
APPLICANT: McAlpine, J B
TITLE OF INVENTION: Recombinant DNA Method for Producing
TITLE OF INVENTION: Erythromycin Analogs
NUMBER OF SEQUENCES: 27
CORRESPONDENCE ADDRESS:
ADDRESSEE: Edward H. Gorman
STREET: Abbott Laboratories D377/AP6D-2 One Abbott
STREET: Park Rd
CITY: Abbott Park
STATE: IL
COUNTRY: US
ZIP: 60064-3500

COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patent in Release #1.0, Version #1.25
CURRENT APPLICATION DATA: US/07/642,734C
APPLICATION NUMBER: US/07/642,734C
FILING DATE: 17-JAN-91
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Dancikers, Andreas M
REGISTRATION NUMBER: 32652
REFERENCE/DOCKET NUMBER: 4952.US.01
TELEPHONE: 708-937-9396
TELEFAX: 708-938-2623
INFORMATION FOR SEQ ID NO: 4:
SEQUENCE CHARACTERISTICS:
LENGTH: 3567 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-07-642-734C-4

```

Query Match 1.7%; Score 106.5; DB 2; Length 3567;
Best Local Similarity 19.9%; Pred. No. 7.4; Indels 465; Gaps 62;
Matches 237; Conservative 104; Mismatches 384;

QY 125 CQGPVVDGAVETTGAE--ICTR-----LGLEPENTILYLVVTALFKBAVFCMNVFLH 174
DB 1165 CPQDILLAAVEAGASAVVCAQDAALREALGDEP-----VTAL-----VH 1205
QY 175 YGGLDIVHINHGDIIRIPLFPVQLFMPDVNRLVPDPENTHHSIGBGFVYTPFYNTGLC 234
DB 1206 AGTL--TNFG-----SISEVAPEEF-----AETIAKTALL 1234
QY 235 HLHDCVIAAPMAVALRV-----RNVTVAVARGAHL-AFDENHEGAVLPDITVT 282
DB 1235 AVL-DEVLGDRAREVYCVSSVAGIWWGAGMAAAYAGSAVLDALAEHHR----- 1282
QY 283 YFQSSSGTTTARGARRNDVNSTKPSFG-----GF--ERRLASIMAAADTALHA-EVIFN 335
DB 1283 -----ARGRSCTSVAMTPWALPGGAVDDGYLREGLRS-LSDARMTWERTVLA 1330
QY 336 TGIYBETPTDIKEWPMFI-OMEGTLPLRNALGSYTVARVAGVIGAMVFSNSALYLTEVED 394
DB 1331 AGPVSVAADV-DWPLVSEGPATRP-----PHLANPQTDROGHVLSSTGSSNTE 444
QY 395 SGMTEAKDGGPSPNFRFYQFAG-----PHLANPQTDROGHVLSSTGSSNTE 444
DB 1366 GGOAEAEPPDS-GPTGEPAQRAGLSPDEOENLELVANAVAE---VLGHESAABINVR 1420
QY 445 FSDVYLALICGFGAPLLARLLFLYERCDAGAFGGHGDALKVYTGTFDSEIPCSLCEKHT 504
DB 1421 RAFSELGLDSLNAALRKRL-----SASTG-----LRLPASL----- 1452
QY 505 RPYCAHTTVHRLRQ--RMPRFGQATROPITGVFGTMNSQYSDCDPL-----GNVA 551

```

Db 1453 --VFDPHTVTLAQHLRLARLVGDADQAAVVRVGAAD-----ESEPFAIVGICRPFPGIGS 1506
 QY 552 PYLILR-----KPGDQTEAA-----566
 Db 1507 PEQLNRVLAEGANLITGPPADRGWDIGRLYHPDPDPGTSVVDKGGFLTRADPDGPFPG 1566
 QY 567 -----KATMDQTYRATLERFLDLQERLLDRGAPCSSEGLSSVVDHPTFR 614
 Db 1567 ITPREALAMPQOQLMLETAWAVERAGIDPDALRGTDGTGVFGWNGQSYMOLLAGEAER 1626
 QY 615 I-----LDTLRARIQT-----TTQPMKVLVETRDYKIREGLSEATHSMAL 655
 Db 1627 VDGQGLGNSASVLSGRATYFEGEGPALVTDTACSSSLVGI--HLAQALRGECSLAL 1684
 QY 656 T-----FDPYGAFCPTINFLVTRHLLAVQDIALSOCHCVFVGGQVQVGRNFRN-----704
 Db 1685 AGGVTVMSDPYT-----FVDFSTOR-----GLA-SDGRCKAFSARADGFALSEGVAAL 1731
 QY 705 QFQVLRERFVDLFGNGGFISTRSIITVLSGEGVAPNPTLGQDAPAG-----RTFDGDLAR 760
 Db 1732 VLEPLSRAR-----ANG-----HQVLAVLRGSANVQDQASGLAALPNPQSERVIRQALAA 1782
 QY 761 VSEVIRDIRVQRVVFSGNCTNLSAAARLVLGLASAYQRQEK-----VDMHL--810
 Db 1783 SGVPA-ADVDV---VEAHGTGTGLCDPTIAG--ALIATYGQDRDRPLRLGSKVKTNIHTQ 1836
 QY 811 -----GALGFLKQFHGLLPRGPNKSPNQFWLLORNQMDKLTHEEITIA 864
 Db 1837 AAAGAAGVKKVLAWRHGL-PRSLHADELSPHIDM-----ESGAVEVLEEVFWPA 1887
 QY 865 AVKRFTEYAAINFINLPPTCIGELAQFYMANLILKYCDHSQYLINTLTSITGARRPRD 924
 Db 1888 GER---PRRAGVSSPGVSGT-----NAHVIVEAPAEQ-----EAAATERG 1925
 QY 925 PSSVLHWIRKDVTSADTETQAKLEKTNLPEL-----WTFATSTHL-VRAAMNQ 977
 Db 1926 PLPFLVLSGRSAVVA--OARALAEHLRDTPELGLTDRANLTATGRADFVRAAV---1978
 QY 978 PMVLGISISKYHGAAGNNRVFOAGNWSGLNGKRVCPLETFDTRFRFIACPRGGFICP 1037
 Db 1979 -----LGDGRAGVCAELDAAEGR-----PSADAVAP 2005
 QY 1038 VTGSSGNRETLSDQVRGIIVSGGMVQLAIYATVVRVAVGARAQHWAFDDWLSLTDDEF 1097
 Db 2006 VT---SAPRKPVL-----VFGGQAQ-----WVG-----2026
 QY 1098 LARDELEHLDQIQTL-----ETPWTVEGALEAVKILDEKTTAGDG 1138
 Db 2027 MARDLLESSEFVFAESMSRCAELSPHTDW-----KLDD--VVRGDG 2065

RESULT 14

US-08-439-009A-4
 ; Sequence 4, Application US/08439009A
 ; Patent No. 6004787
 ; GENERAL INFORMATION:
 ; APPLICANT: Donadio, S
 ; APPLICANT: Katz, L
 ; APPLICANT: Mcalpine, J B
 ; TITLE OF INVENTION: Method of Directing Biosynthesis of
 ; TITLE OF INVENTION: Specific Polyketides
 ; NUMBER OF SEQUENCES: 27
 ; CORRESPONDENCE ADDRESS:
 ; ADDRESSEE: Steven F. Weinstein
 ; STREET: Abbott Laboratories D377/AP6D-2 One Abbott
 ; STREET: Park Rd
 ; CITY: Abbott Park
 ; STATE: IL
 ; COUNTRY: US
 ; ZIP: 60064-3500
 ; COMPUTER READABLE FORM:
 ; MEDIUM TYPE: Floppy disk
 ; COMPUTER: IBM PC compatible

OPERATING SYSTEM: PC-DOS/MS-DOS
 SOFTWARE: PatentIn Release #1.0, Version #1.25
 CURRENT APPLICATION DATA: US/08/439,009A

APPLICATION NUMBER: US/08/439,009A
 FILING DATE: 11-MAY-1995

CLASSIFICATION: 435
 ATTORNEY/AGENT INFORMATION:

NAME: Casuto, Dianne
 REGISTRATION NUMBER: 40,943

REFERENCE/DOCKET NUMBER: 4952.US.D1
 TELECOMMUNICATION INFORMATION:

TELEPHONE: 847-938-3137
 INFORMATION FOR SEQ ID NO: 4:

SEQUENCE CHARACTERISTICS:
 LENGTH: 3567 amino acids

TYPE: amino acid
 TOPOLOGY: linear

MOLECULE TYPE: protein
 US-08-439-009A-4

Query Match 1.7%; Score 106.5; DB 3; Length 3567;
 Best Local Similarity 19.9%; Pred. No. 7.4;

Matches 237; Conservative 104; Mismatches 384; Indels 465; Gaps 62;

QY 125 CQPPVDCGAVETTCAB--ICTR-----LGLPEPNTILYLVVTLFKEAVFMCNVFLH 174
 Db 1165 CPGDDLLAAVEAGASAVCAQDAALREALGDEP-----VTAL-----VH 1205

QY 175 YGGDLIVHINHGDVIRPLFPVQLFMDVNLVDPFNTHRHSIGEGVYVPTFPYNTGLC 234
 Db 1206 AGTL-----TNFG-----SISEVAPESP-----AETIAAKTALL 1234

QY 235 HLIHDCVIAPIAVALRV-----RNVTAVARGAAHL-AFDENHEGAVLPPIITYT 282
 Db 1235 AVL-DEVLGDRVREYVYCSVAGIKGAGMAAAYAGSAYDLALAEHR-----1282

QY 283 YFQSSSGTTTARGARENDVNSTKPSPG-----GF--ERRLASIMAADTALHA-EVIFN 335
 Db 1283 -----ARGRSCTSVANTPWALPGGAVDDGYLREGLRS-LSADRAMEWTWVLA 1330

QY 336 TGIYEETPTDIKWPFI-GMEGTLPRLNALGSYTRAVAGVIGAMVSPNSALYLTVEVD 394
 Db 1331 AGPVSAVADV-DWFLVSEGFATRP-----TALFASLAGR 1365

QY 395 SGMTAKDGGGFSFNRYQFAG-----PHLAANPQTRDRDGHVLSSTGSSNTE 444
 Db 1366 GGQAEAPDS-GPTGEPAQRLAGLSPEQOENLELVANAVAE-----VLGHESAAEINVR 1420

QY 445 FSDVYLALICGFGAPILARLLFYLERCDAGAPFGGHGDALKYVTGTFDSEIPCSCKEHT 504
 Db 1421 RPFSELGLDSINAMAKRL-----SASTG-----LRLPASL-----1452

QY 505 RPVCATTVHRLRQ--RMPRFGOATROPIGVFGTWMNSQYSDCDPL-----GNYA 551
 Db 1453 --VFDHPTVTALAQHLRLARLVGDADQAAVVRVGAAD-----ESEPFAIVGICRPFPGIGS 1506

QY 552 PYLILR-----KPGDQTEA-----566
 Db 1507 PEQLNRVLAEGANLITGPPADRGWDIGRLYHPDPDPGTSVVDKGGFLTRADPDGPFPG 1566

QY 567 -----KATMDQTYRATLERFLDLQERLLDRGAPCSSEGLSSVVDHPTFR 614
 Db 1567 ITPREALAMPQOQLMLETAWAVERAGIDPDALRGTDGTGVFGWNGQSYMOLLAGEAER 1626

QY 615 I-----LDTLRARIQT-----TTQPMKVLVETRDYKIREGLSEATHSMAL 655
 Db 1627 VDGQGLGNSASVLSGRATYFEGEGPALVTDTACSSSLVGI--HLAQALRGECSLAL 1684

QY 656 T-----FDPYGAFCPTINFLVTRHLLAVQDIALSOCHCVFVGGQVQVGRNFRN-----704
 Db 1685 AGGVTVMSDPYT-----FVDFSTOR-----GLA-SDGRCKAFSARADGFALSEGVAAL 1731

QY 705 QFQVLRERFVDLFGNGGFISTRSIITVLSGEGVAPNPTLGQDAPAG-----RTFDGDLAR 760

Db 1732 VLEPLSRAR-----ANG-----HQVLAVLRGSVNVQDQASNGLAAPNGPSOERVIRQALAA 1782
Qy 761 VSEVIRDIRVNRVVSFGNCTNLSEAAARLVGLASAYQORQKR-----VDMHLH-- 810
Db 1783 SGVPA-ADVIV---VEAHGTGTELGDPIEAG--ALIAITYGQDRDRPLRLGSGVKNIGHTQ 1836
Qy 811 -----GALGFLKQFGLHLLPROMPNKSPNPQFWTLQKQNPADKLTHEEITTTIA 864
Db 1837 AAGAAGVIVKVLAVRHGML-PRSLHADELSPHIDW-----ESGAVEVLRVEEVPWPA 1887
Qy 865 AVKFTTEYRAINFILPPTTCIGELAQFYMANLILKYCDHSQVYLNTLTLTIIITGASRPD 924
Db 1888 GER---PRACVVSFGVSGT-----NAHVIVEEAPAEQ-----EAARTERG 1925
Qy 925 PSSVLHWRKDVTSAAIDETQAKALLEKTENLPEL-----WTTAFTSTHL-VRAANNQR 977
Db 1926 PLPVLVLSRSEAVVAA-----CARALAEHLRDTPELGLTDAWTATGAREDFVRAAV-- 1978
Qy 978 PMVLGISISIKYHGAAGNNRVFQAGNWSGLNGKNCVCELTFTFDETRFIACPRGGFICP 1037
Db 1979 -----LGDRAVCAELDALAEBR-----PSADAVAP 2005
Qy 1038 VTPSSGNRETTLSQVIRGIIIVSGGAMVQLAIYATVVRVAVGARAQHMAFDWLSLTDDDEF 1097
Db 2006 VT---SAPRKPVL-----VFPQGGAQ-----WVG----- 2026
Qy 1098 LARLEELHDOIIOTL-----ETPWTVEGALEAVKILDEKTTAGDG 1138
Db 2027 MARDILLESSEVFAESMSRCAEALSPTIDW-----KLLD--VVRGDG 2065

RESULT 15
US-07-731-157A-7
; Sequence 7, Application US/07731157A
; Patent No. 5457032
; GENERAL INFORMATION:
; APPLICANT: Quax, Wilhelmus J.
; APPLICANT: Misset, Onno
; APPLICANT: Van der Laan, Jan M.
; APPLICANT: Lutting, Herman B.M.
; TITLE OF INVENTION: Mutated beta-lactam acylase genes
; NUMBER OF SEQUENCES: 50
; CORRESPONDENCE ADDRESS:
; ADDRESSER: COOLEY GODWARD CASTRO HUDDLESON & TATUM
; STREET: FIVE PALO ALTO SQUARE, 4TH FLOOR
; CITY: PALO ALTO
; STATE: CALIFORNIA
; COUNTRY: USA
; ZIP: 94306
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent In Release #1.0, Version #1.25 (EPO)
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/07/731,157A
; FILING DATE: 19910509
; CLASSIFICATION: 435
; PRIORITY APPLICATION DATA:
; APPLICATION NUMBER: EP 90200962
; FILING DATE: 18-APR-1990
; ATTORNEY/AGENT INFORMATION:
; NAME: RAE-VENTER PH.D., BARBARA
; REGISTRATION NUMBER: 32,750
; REFERENCE/DOCKET NUMBER: GBRO-027/000S
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: 415-494-7622
; TELEFAX: 415-857-0663
; TELEX: 380816 COOLEY PA
; INFORMATION FOR SEQ ID NO: 7:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 774 amino acids

; TYPE: AMINO ACID
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; HYPOTHETICAL: NO
; ORIGINAL SOURCE:
; ORGANISM: Pseudomonas species
; STRAIN: SE83
; US-07-731-157A-7
Query Match 1.7%; Score 186; DB 1; Length 774;
Best Local Similarity 20.2%; Pred. No. 0.47;
Matches 145; Conservative 79; Mismatches 251; Indels 242; Gaps 37;
Qy 258 ARGAAHLAFDENHGAVALPPDITVTFQSSSSGTTTARGARNNDVNSTSKPSGSGFER 316
Db 183 ANALKLRVDDGQDLICIPFGVEARELEADLAALRPDAVDALLKAMGGDASDAAGGSNN 242
Qy 317 -----RLAS-----INAAATLHAHVFINTGIVYEETPTDIKEMPMFIGMEGTPLRLNALGS 367
Db 243 WAVAPOGTATGPILAGDPHRVFEI---PGMYAQHLCACDRFDM-IGL--TVP----- 289
Qy 368 YTVAVAGVIGAMVSPNSA-----LVLTVEVDSGMT----- 399
Db 290 -----GVPGFPHFAHNGKVCVTHAFMDIHLVLEQFAEDGRTARFGNEPEFVANRWD 343
Qy 400 --AKOGGPGPSFNRYQFAGPHLAANPQTRDGHVLSQSSTGSSNTSFVSVDYLALICFGF 457
Db 344 RIAVRGADREFDIVETREHGPVIAGDP---LEGAALTLSVQFAETDLSDFDCLTRMP--G 398
Qy 458 APLARLLFYLERCDAGATG--GH-----GDALKYVTGTFDSEIPLCSLCEKHTRPVCAHT 511
Db 399 ASTVAQLY-----DATRGWGLIDHNLVAGDVAGSIGHLVRAVRPSRPRENGWLPVPGWS 452
Qy 512 TVHLRL-----QRMPRFGQATROPIGVFGTMNSQY-----SDCDPLGNYPAYP--- 553
Db 453 GEHEWNGWIPHEAMP---VIDPPGGLIYVANNRVVADDDHDPVLYCTDCHP-----PYRAE 504
Qy 554 ---LILRKPQDTEAAKATMQDT-----VYATLERLFI--DLQERL----- 590
Db 505 RIMERLVASPAFAVDDAAAHADTLSPHVGLLRARLEALGIQGLSPAELRQTLIAWDGR 564
Qy 591 LDREGAPCSSEGLSSVIVDPTFRRIIDTLRARIEQITTFQMKVLVETRDYKIREGLSEA- 649
Db 565 MDAGSQAASA-----YNAFRAL-----TRLVTARSGLAQAI 596
Qy 650 THSMALT---FDYPGAFCPITNFLVKRTHLAVVQ---DLALSOCHCVFYGOQVEGRNF 702
Db 597 AHPFAAVPPGVSPQGVWVAVPT--LLRNDGAGMLKGSWDEALSEALSV-ATQNLTRGW 654
Qy 703 RNQFQVLRFRFVDFLFGGFISTRITVILSEGVSPAP-----NFTLGODAP 749
Db 655 GEEHRP-----RFTPLSAQPPAWAALL-----NPVSRPIGGDGTVLNGLVPSAGPEAT 705
Qy 750 AGRTFDGDLARVSVEVIRDIRVKNRVVFS--GNCNTLSEAAARLVGLASAYQORQKRVDM 808
Db 706 YG-----ALSRYVFDVGNWDN-----SRWVV 726
Qy 809 LHGALGFLKQFHGLLFPROMPNKSPNPQW-----FWTLQORNQMPADKLTHEEI 860
Db 727 FHGASG-----HPSAPHYADQAPWSDCAMVPMYLSWDRIAAEAVTSQEL 771

RESULT 16
US-08-541-780-7
; Sequence 7, Application US/08541780
; Patent No. 5935831
; GENERAL INFORMATION:
; APPLICANT: Quax, Wilhelmus J.
; APPLICANT: Misset, Onno
; APPLICANT: Van der Laan, Jan M.
; APPLICANT: Lutting, Herman B.M.
; TITLE OF INVENTION: Mutated beta-lactam acylase genes
; NUMBER OF SEQUENCES: 50

CORRESPONDENCE ADDRESS:
 ADDRESSEE: COOLEY GODWARD CASTRO HUDDLESON & TATUM
 STREET: FIVE PALO ALTO SQUARE, 4TH FLOOR
 CITY: PALO ALTO
 STATE: CALIFORNIA
 COUNTRY: USA
 ZIP: 94306
 COMPUTER READABLE FORM:
 MEDIUM TYPE: Floppy disk
 COMPUTER: IBM PC compatible
 OPERATING SYSTEM: PC-DOS/MS-DOS
 SOFTWARE: Patent In Release #1.0, Version #1.25 (EPO)
 CURRENT APPLICATION DATA:
 APPLICATION NUMBER: US/08/541,780
 FILING DATE:
 CLASSIFICATION: 435
 PRIOR APPLICATION DATA:
 APPLICATION NUMBER: US/07/731,157
 FILING DATE:
 APPLICATION NUMBER: EP 90200962
 FILING DATE: 18-APR-1990
 ATTORNEY/AGENT INFORMATION:
 NAME: RAE-VENTER PH.D., BARBARA
 REGISTRATION NUMBER: 32,750
 REFERENCE/DOCKET NUMBER: GBRO-027/0005
 TELECOMMUNICATION INFORMATION:
 TELEPHONE: 415-494-7622
 TELEFAX: 415-857-0663
 TELEX: 390816 COOLEY PA
 INFORMATION FOR SEQ ID NO: 7:
 SEQUENCE CHARACTERISTICS:
 LENGTH: 774 amino acids
 TYPE: amino acid
 TOPOLOGY: linear
 MOLECULE TYPE: protein
 HYPOTHETICAL: NO
 ORIGINAL SOURCE:
 ORGANISM: Pseudomonas species
 STRAIN: SE83
 US-08-541-780-7

Query Match 1.7%; Score 106; DB 2; Length 774;
 Best Local Similarity 20.2%; Pred. No. 0.47;
 Matches 145; Conservative 79; Mismatches 251; Indels 242; Gaps 37;
 QY 258 ARGAAHLADENEGAV-LPPDITYFOSSSGTTTARGARRNDVNSTKSPSGGPER 316
 DB 183 AANALKRIRYDGGDLCLCPGVEARLEADLALRPAYDALLKAMGGDASDAAGGSNN 242
 QY 317 -----RLAS---IMAAATLALAEVIFNTGIYBETPTDIKWPMTFGMEGTLPRLNALGS 367
 DB 243 WAVAPGRTATGRFILAGDPHRVFEI---PGMYAQHHLACDRFDM-IGL--TVP----- 289
 QY 368 YVARVAGVICAMVSPNSA-----LYLTVEDSDGTE----- 399
 DB 290 -----GVPGPFPHANGKVAVCVTHAFMDIHDLXLEQFAEDQRTARFNEPEPVAMRRD 343
 QY 400 --AKDGGPSPNRFQFAGPHLAANPQTRDGHVLSQSSTSSNTSFSDYIALICGFG 457
 DB 344 RIAVGGADREFDIVETRHGCPVIAGDP---LEGAALTLSVQPAETDLSFDCLTMP--G 398
 QY 458 APILLARLLFVLEKCDAGFTG--GH-----GDALKYVTGTFDSEIPCLCEKTRPVCALT 511
 DB 399 ASTVAQLY-----DATRGWGLIDHNLVAGSDVAGSIGHLVRAKVPSPRPNGLVPFGWS 452
 QY 512 TVHRLR-----QRMPRFGQATROPIGVFGTMNSQY-----SDCDPLGNVAPY--- 553
 DB 453 GEHEWRGWIPHEAMPR---VIDPPGGLIVTANRRVADDDHPDYLCTDCHP-----PYRAE 504
 QY 554 -----LILRKPGDQTEAAKATMQDT-----YATLERLFI--DLQERL----- 590
 DB 505 RIMERLVASPAFVDDAAAHAHTLSPHVGILLRLARLEALIGLSLPAEELRQTLIAWDGR 564

QY 591 LDRGAPCSSEGLSSVIVDHTFFRILDTLRARIEQTTQFMKVLVETRDYKIREGLSEA- 649
 DB 565 MDAGSQAAASA-----YNAPFRAL-----TRLVTARSGLEQAI 596
 QY 650 THSMALT---PDYSGAFCEITNFKVKTTHLAVVQ---DLALSQCHCVFYGOQVEGRNF 702
 DB 597 AHPEAAVPPGVSPGQVWAVPT-LLRNDGAGMLKGMWDSEALSV-ATQNLTRGW 654
 QY 703 RNQFQVLRFRFVLDLFGGFISTRSITVTLSGPPVSAP-----NPTLGDAP 749
 DB 655 GEEHRP-----RFTPLSAQFPAAWALL-----NPVSRPIGGDGTWLANGLVPSAGEAT 705
 QY 750 AGRTFDGDLARVSVEVIRDIRVKNRVVFS-GNCTNLSEAAARLVGLASAYQOQEKRVDM 808
 DB 706 YG-----ALSRYVDFGVNDN-----SRVVV 726
 QY 809 LHGALGFLKQFHGLLPFGMPNPSKSPNQW-----FWTLQRNQMPAKLTHEEI 860
 DB 727 FHGASG-----HPASPHYADQNAFWDSCAMVPMYSLWDRIAABAVTSQEL 771
 RESULT 17
 US-09-107-532A-3855
 ; Sequence 3855, Application US/09107532A
 ; Patent No. 6583275
 ; GENERAL INFORMATION:
 ; APPLICANT: Lynn A Doucette-Stamm and David Bush
 ; TITLE OF INVENTION: NUCLEIC ACID AND AMINO ACID SEQUENCES RELATING TO
 ; ENTEROCOCCUS FAECIUM FOR DIAGNOSTICS AND THERAPEUTICS
 ; NUMBER OF SEQUENCES: 7310
 ; CORRESPONDENCE ADDRESS:
 ; ADDRESSEE: GENOME THERAPEUTICS CORPORATION
 ; STREET: 100 Beaver Street
 ; CITY: Waltham
 ; STATE: Massachusetts
 ; COUNTRY: USA
 ; ZIP: 02354
 ; COMPUTER READABLE FORM:
 ; MEDIUM TYPE: CD-ROM ISO9660
 ; COMPUTER: PC
 ; OPERATING SYSTEM: <Unknown>
 ; SOFTWARE: ASCII
 ; CURRENT APPLICATION DATA:
 ; APPLICATION NUMBER: US/09/107,532A
 ; FILING DATE: 30-Jun-1998
 ; PRIOR APPLICATION DATA:
 ; APPLICATION NUMBER: 60/085,598
 ; FILING DATE: 14 May 1998
 ; APPLICATION NUMBER: 60/051571
 ; FILING DATE: July 2, 1997
 ; ATTORNEY/AGENT INFORMATION:
 ; NAME: Ariniello, Pamela Deneke
 ; REGISTRATION NUMBER: 40,489
 ; REFERENCE/DOCKET NUMBER: GTC-012
 ; TELECOMMUNICATION INFORMATION:
 ; TELEPHONE: (781)893-5007
 ; TELEFAX: (781)893-8277
 ; INFORMATION FOR SEQ ID NO: 3855:
 ; SEQUENCE CHARACTERISTICS:
 ; LENGTH: 1095 amino acids
 ; TYPE: amino acid
 ; TOPOLOGY: linear
 ; MOLECULE TYPE: protein
 ; HYPOTHETICAL: YES
 ; ORIGINAL SOURCE:
 ; ORGANISM: Enterococcus faecium
 ; FEATURE:
 ; NAME/KEY: misc feature
 ; LOCATION: (5) LOCATION 1...1095
 ; SEQUENCE DESCRIPTION: SEQ ID NO: 3855:
 ; US-09-107-532A-3855

Query Match 1.7%; Score 105.5; DB 4; Length 1095;

Best Local Similarity 18.9%; Pred. No. 1;
Matches 145; Conservative 112; Mismatches 298; Indels 211; Gaps 35;
QY 551 APYLILKPGQDTEAAKATMDQTVATLRLFLIDLEQLLDRGAPCSSEGLS-----S 604
Db 360 APYDITDPTMTTKAGETIVTSKNAQKGOILDKSG-VETGSDLWNDNYSLAGNTFA 418
QY 605 VIVDHPTRRILD-TLRRARIEQTTPQMKVLIVETRDYKIREGLSEATHSMALTFDP--- 659
Db 419 IRKDSPTGEIIVQEMTTDENGHAETPKETANALELGTYYVTE--TKASHGFNTFKPKVKE 476
QY 660 --YSGAFPCITNFWLVRTHLAVQDLAL-----SQHCVFYGOQV-----BGR- 700
Db 477 LKYANQTVLVTNKGQONQEVGETTLTKEDKDTGDKAQKAVFEGTEYTLFTAKDGKA 536
QY 701 -NERNQFQVLRFRFVDFLNGSGFTSTRSITVTLSGFPVSAP-----NPTLGQD--APAGR 752
Db 537 VKNSEAFK-----EMVKTASDETVLALDKQAQVXHLAINEYTWQETKAPEGY 589
QY 753 TFDGLARVSVE-----VIRDIRVQRVV-----FSGNCTNLSEAA----- 788
Db 590 TLDKTYFVSIKKVDDNEKNAVITRDVTAKEQIIRFGDFPKFAGSAAGTAETGENDLTF 649
QY 789 -RARIVLGASAYQKQKRVDMHGLGF-----LLKQFHGLLFPFGM----- 829
Db 650 KVSFLEGTNEITGADEATTATNEQLGFDGYGKFPENLPYGDYLLEVEA---PEGFKIT 706
QY 830 PPNSKSP-----NPOFWTLORNO-----MPADKLTHEBITTIAAVKRTTEE 872
Db 707 PLEIRSTFKENKEDPVKSEYVFTITEQDQKQPIKTVIPYEKLIN-----KASVS 757
QY 873 YAAINFILNP-PTCIGELAQFYMANLILKYCHDSQVILNTLSITIGARRPRDPSVLH 930
Db 758 LNRLMYLDPEDSLTSLATWCKGNKELTSLDSTE-LVDKL-----SYNLH 803
QY 931 WIKRD---VTSAAIDETQAKALLEKTENLPWLTTAFTSTHLVRAAMN---QRPVW-- 980
Db 804 EIKEDWYVVAQIDVDA--TKAAQKDEKAKEV-VIAETSATLANKEKTGTWKIOKLTAE 861
QY 981 -VLGISISKYHGAAGNNRVFOAGNWSGLNGKNVCLPFTEDTRRRFIIACPRGFGICPVT 1039
Db 862 QVLNKTIVLNVVYENKEAFEGD-----KQVA 889
QY 1040 GPSSGNRETTLSQVRGIIVSGGAMVQLAIYATVVRVAGARAQMAFDDWLSLTDDEFLA 1099
Db 890 -----KDVSLNQAQTVSCVVEHVSITQKHAHLENG-----SQTFTGHDVVDMPDVSIT 939
QY 1100 RDL---BELHQDIIOTLETWTEVEGALAEVKILDE-----XTT-----AGDGETPTNL 1144
Db 940 HDVLGSKAEFETILYALLPGTTHKEIWKSKIYEVNDKEFTTIVLAKKVDYTKYPEGT 999
QY 1145 APNFDSCPSHDTTSN-----VLNISGNSIGSTVPGKLRPPEDDE 1185
Db 1000 KFTFAEINVDKGTINGKHNEDLKESQTLAPKEVPTILSTPKOPE 1045

RESULT 18
US-08-633-760-46
; Sequence 46, Application US/08633760
; Patent No. 5804429
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: SAITO, YOSHIMASA
; APPLICANT: FUJIMURA, TAKAO
; APPLICANT: ISHII, YOSHINORI
; APPLICANT: NOGUCHI, YUJI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 64
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT,
; ADDRESSEE: P.C.
; STREET: 1755 JEFFERSON DAVIS HIGHWAY, SUITE 400
; CITY: ARLINGTON

STATE: VIRGINIA
COUNTRY: USA
ZIP: 22202
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patent In Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/633,760
FILING DATE: 01-MAY-1996
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: OBLON, NORMAN F.
REGISTRATION NUMBER: 24,618
REFERENCE/DOCKET NUMBER: 18-929-0 PCT
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 46:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-633-760-46

Query Match 1.7%; Score 105; DB 1; Length 774;
Best Local Similarity 20.7%; Pred. No. 0.6;
Matches 146; Conservative 76; Mismatches 241; Indels 242; Gaps 37;
QY 109 LTR--ACNAARERFGRSQGPPVGVGAVTTGAB-ICTR-----LGLEPENTILYLVVTAL 161
Db 70 LTRRKALGAAAEWLG---AEEAEADILVRRLGKVKCRDRDFEALGYEAKD-----M 117
QY 162 FKEAVPMQCNVFLHYGLDIVHINHGVDVIRIPFVQLFMPDVNRLVPDPFNTH-----R 216
Db 118 LRAYAGVNAFLASGA-----PL-PVEYGLLGAE---PEWEPHMSIAVMR 159
QY 217 SIGEGFVYPTFPYNTGLCHLIHDCVIAPMVALRVNVTAV-----ARGAAHLAFDENHEG 272
Db 160 RLG-----LLMGAVNFKLWMLALPVVGAANALKRLYDDGGRD 197
QY 273 AV-LPPDITYTTFQSSSGTTTARGARRNDVNSTKPSPSGGER-----RLAS---IM 322
Db 198 LLCIPPGABADRLLEADLATLRPAVDALLKAMGGDASDAAGGNNWAVAPGTATGRPIL 257
QY 323 AADTALHAEVIENTGTYEETPTDIKEWPMFIGMEGTLPRLNALGSYTARVAGVIGAMVFS 382
Db 258 AGDPHRVFEI---PGMYAQHLLACORFDM-IGL--TVP-----GVGFPFHEA 298
QY 383 FNSA-----LYLTEVDSGMT-----AKDGGGSPSNRF 412
Db 299 HNGKVAYCVTHAFMDIHDLYLEQFAGEGRTARFGNDPEFVAMSRDRIAVRGGADEFDIV 358
QY 413 YQFAGPHLAANPQTRDRDGHVLSQSSTNTSFFSDVYDALICFGAPLLARLLFYLERCD 472
Db 359 ETRHGPVIAQDP---RDGAULTRSVQPAETDLSFCLTRMP--GASTVAQLY-----D 407
QY 473 AGAFTG--GH-----GDALKYVTGTDFSEIPCSLCEKHTRPVCAHTTVHRLR-----QRMP 521
Db 408 ATRGWGLIDHNLVAGDVAGSIGHLVRAVPSPRENGMLPVPGWSEHEWRGWIPEAMP 467
QY 522 RFQATRTQPIGVFGTNNVSY-----SCDPLGNVAPY-----LILRKPDQDTE 564
Db 468 R---VIDPPGGIIVTANNRVADDHDPDYLCCTCHP-----PYRAERIMKRLVANPAFVD 519
QY 565 AAKATMQDTYRATLERLFDLQERLLDRGA--PCSSGLSSVIV-----D 608
Db 520 DAAAIHADTLSP-----HVGLLRRLLEALGARDSDSAEGLRQMLVAVDGRMDAAASEVAGA 574
QY 609 HPTFRILDTL---RARIQTTTQ-----FMKVLVETEDYKIREG--- 645

Db 575 YNAFRALRLVTDRLGSLQAISHPFAA VAPGVSPQGVWVAVPTLLRDDDDAGMLKGWSW 634
QY 646 ---LSEA-----THSMALTFDPYSGAFCP 666
Db 635 DQALSEALSASQNLTRSGWGEHRPFTHTPLATQFPWAGLNP 679

RESULT 19
US-08-633-760-48
; Sequence 48, Application US/08633760
; Patent No. 5804429
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: SAITO, YOSHIMASA
; APPLICANT: FUJIMURA, TAKAO
; APPLICANT: ISHII, YOSHINORI
; APPLICANT: NOGUCHI, YUJI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 64
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MATIER & NEUSTADT,
; ADDRESSEE: P.C.
; STREET: 1755 JEFFERSON DAVIS HIGHWAY, SUITE 400
; CITY: ARLINGTON
; STATE: VIRGINIA
; COUNTRY: USA
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.30
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/633,760
; FILING DATE: 01-MAY-1996
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: OBLON, NORMAN F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-929-0 PCT
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703) 413-3000
; TELEFAX: (703) 413-2220
; TELEX: 248855 OFAT UR
; INFORMATION FOR SEQ ID NO: 48:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 774 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; US-08-633-760-48

Query Match 1.7%; Score 105; DB 1; Length 774;
Best Local Similarity 20.7%; Pred.No. 0.6;
Matches 146; Conservative 76; Mismatches 241; Indels 242; Gaps 37;

QY 109 LTR--ACNARERFGSRGCGPPDVGAVETGAE-ICTR-----LGLPENTILYLVTAL 161
Db 70 LTRRKALGAAEWLGL---AFAAEADILVRRLGMEKVCREDFAALGYEAKD-----M 117
QY 162 FKEAVFMCNVFLHYGSLDVIHNGDVIRIPLFPVQLFMPDVNRLVPDPFNTH-----R 216
Db 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAEE---PEPEWPHSIAYNR 159
QY 217 SIGEGFVYPTFPFYNTGLCHLHDCVAPMAVALRVNVTAV-----ARGAAHLAFDENEG 272
Db 160 RLQ-----LLMGSVNFKLWRMLALPVVGAANALKRLRYDDGGDR 197
QY 273 AV-LPPDITYTYFQSSSGTTTARGARRNDVNSTKSPSGGFER-----RLAS---IM 322
Db 198 LCIPGAZADRLLEADLALRLPAVDALLKAMGDSADAACGGSNNWAVAPGTAIGRPIL 257

QY 323 AADTALHAEVIENTGIYEETPTDIKEWPMFIGMGTLPRLNALGSLYARVAGVIGAMVFS 382
Db 258 AGDHRVFEI---PGIYAQHHLACDRFDM-IGL--TVP-----GVPGFPHFA 298
QY 383 PNSA-----LYLTVESGGMTE-----AKGGPGPSPNRF 412
Db 299 HNGKVAYCVTHAFMDIHDLYLEQFAGEGRFARFGNDFEPVAVSRDRITAVRGGAADREFDIV 358
QY 413 YQFAGPHLAANPQDTRDGHVLSQSGSTGNTSFSDYALICGAPGLLARLLFYLRSCD 472
Db 359 KTRHGPIVAGDP---RDGAALTILRSVQFATDILSFDCLTRMP--GASTVAQLY-----D 407
QY 473 AGAFTG--GH-----GDALKYVTGTDFSEIFCSICEKHTRPVCAHTTVHRLR-----QRMP 521
Db 408 ATRCGGLIDHNLVAGDVAGSIGHLVRAVRPSRPRENGMLPVPGWSGEHEWRGWIPEAMP 467
QY 522 RFGQATROPIGVFGTMSQY-----SDCDPLGNYPY-----LILRKPQOTE 564
Db 468 R---VIDPPGGIIVTANNRVVADDDHDPYLCTDCHP-----PYRAERIMKRLVANPAFAVD 519
QY 565 AAKATMODTYRATLERLFDLEQERLLDRGA--PCSEGLSSVIV-----D 608
Db 520 DAAAIHADTLSP-----HVGLLRRRLREALGARDDSAAGLRQMLVAMDGMRDAAASEVASA 574
QY 609 HPTFRRIIDLTL---RARIQTTTQ-----FMKVLVETRDYKIREG--- 645
Db 575 YNAFRALRLVTDRLGSLQAISHPFAA VAPGVSPQGVWVAVPTLLRDDDDAGMLKGWSW 634
QY 646 ---LSEA-----THSMALTFDPYSGAFCP 666
Db 635 DQALSEALSASQNLTRSGWGEHRPFTHTPLATQFPWAGLNP 679

RESULT 20
US-08-931-608A-5
; Sequence 5, Application US/08931608A
; Patent No. 6302685
; GENERAL INFORMATION:
; APPLICANT: Lobel, Peter
; APPLICANT: Sleat, David B.
; TITLE OF INVENTION: NOVEL HUMAN LYSOSOMAL PROTEIN AND METHODS OF ITS USE
; NUMBER OF SEQUENCES: 12
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: David A. Jackson, Esq.
; STREET: 411 Hackensack Ave, Continental Plaza, 4th Floor
; CITY: Hackensack
; STATE: New Jersey
; COUNTRY: USA
; ZIP: 07601
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.30
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/931,608A
; FILING DATE:
; CLASSIFICATION: 514
; ATTORNEY/AGENT INFORMATION:
; NAME: Jackson Esq., David A.
; REGISTRATION NUMBER: 26,742
; REFERENCE/DOCKET NUMBER: 601-1-077
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: 201-487-5800
; TELEFAX: 201-343-1684
; INFORMATION FOR SEQ ID NO: 5:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 635 amino acids
; TYPE: amino acid
; STRANDEDNESS: single
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; HYPOTHETICAL: NO


```
US-08-931-608A-5
Query Match          1.7%; Score 104.5; DB 4; Length 635;
Best Local Similarity 21.0%; Pred. No. 0.47;
Matches 77; Conservative 36; Mismatches 121; Indels 133; Gaps 14;

QY 245 MAVALRVNTAVARGAAHLAFDENH-EGAVLPDPDITYFYQSSSSGTTTARGARNVDVN 303
DB 10 VAIALAMSSLSAHD-----AWVSTHTQAAMSPASTQVLAASSTATTGNA---YTLN 62
QY 304 STKSPSPSGFFERRLASIMAADTALHAEVIFNTGIYEETPTDIKEMPFIEMEGTLPLRN 363
DB 63 MTGSPRIDGA-----AVTLEADHPLHVEALK-----LNPD 95
QY 364 ALGYSYARVAGVIGAMVSPNSALYLTEVEDSGMTEAKDGGPGSPFNRFYQFAGPHLAAN 423
DB 96 ALQTFLAGVT-----TPGSALFGKFLTPSQFTE-----RF-----GP----- 127
QY 424 POTDRDGHVLSQSGTSNTEFSVDYLALICGFGAPLLARLLFYLERCDAGATGCGHGA 483
DB 128 TQSQVDVAVAHLQQAAGFTNIEVAPNRL-LISADGT-----AGAATNGFRTS 172
QY 484 LKVVYTGTFDSEIPCSLCEKHTRPVCAHTTVHRLQRMPRFQATROPFGVGTWMSQYSD 543
DB 173 IK-----RFSANGR----- 181
QY 544 CDPLGNYAPYLILRKPGDQTEAAKATMDTYRATLERFLIDLEQERLLDRGAPCSSEGLS 603
DB 182 -EFFANDAPALVPASIGDSVNAVGLQNVSKVHTLHHVY---HPEDVTVPGNVGTQAAA 237
QY 604 SVIVDHP 610
DB 238 AVAAHP 244

RESULT 21
US-09-851-847-5
; Sequence 5, Application US/09851847
; Patent No. 6638712
; GENERAL INFORMATION:
; APPLICANT: Lobel, Peter
; Sleaf, David E.
; TITLE OF INVENTION: NOVEL HUMAN LYSOSOMAL PROTEIN AND METHODS OF ITS
; NUMBER OF SEQUENCES: 12
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: David A. Jackson, Esq.
; STREET: 411 Hackensack Ave, Continental Plaza, 4th Floor
; CITY: Hackensack
; STATE: New Jersey
; COUNTRY: USA
; ZIP: 07601
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.30
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/09/851.847
; FILING DATE: 09-May-2001
; CLASSIFICATION: <Unknown>
; PRIOR APPLICATION DATA:
; APPLICATION NUMBER: 08/931,608
; FILING DATE: <Unknown>
; ATTORNEY/AGENT INFORMATION:
; NAME: Jackson Esq., David A.
; REGISTRATION NUMBER: 26,742
; REFERENCE/DOCKET NUMBER: 601-1-077
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: 201-487-5800
; TELEFAX: 201-343-1684
; INFORMATION FOR SEQ ID NO: 5:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 635 amino acids
; TYPE: amino acid
; STRANDEDNESS: single
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; HYPOTHETICAL: NO
; SEQUENCE DESCRIPTION: SEQ ID NO: 5:
US-09-851-847-5
Query Match          1.7%; Score 104.5; DB 4; Length 635;
Best Local Similarity 21.0%; Pred. No. 0.47;
Matches 77; Conservative 36; Mismatches 121; Indels 133; Gaps 14;

QY 245 MAVALRVNTAVARGAAHLAFDENH-EGAVLPDPDITYFYQSSSSGTTTARGARNVDVN 303
DB 10 VAIALAMSSLSAHD-----AWVSTHTQAAMSPASTQVLAASSTATTGNA---YTLN 62
QY 304 STKSPSPSGFFERRLASIMAADTALHAEVIFNTGIYEETPTDIKEMPFIEMEGTLPLRN 363
DB 63 MTGSPRIDGA-----AVTLEADHPLHVEALK-----LNPD 95
QY 364 ALGYSYARVAGVIGAMVSPNSALYLTEVEDSGMTEAKDGGPGSPFNRFYQFAGPHLAAN 423
DB 96 ALQTFLAGVT-----TPGSALFGKFLTPSQFTE-----RF-----GP----- 127
QY 424 POTDRDGHVLSQSGTSNTEFSVDYLALICGFGAPLLARLLFYLERCDAGATGCGHGA 483
DB 128 TQSQVDVAVAHLQQAAGFTNIEVAPNRL-LISADGT-----AGAATNGFRTS 172
QY 484 LKVVYTGTFDSEIPCSLCEKHTRPVCAHTTVHRLQRMPRFQATROPFGVGTWMSQYSD 543
DB 173 IK-----RFSANGR----- 181
QY 544 CDPLGNYAPYLILRKPGDQTEAAKATMDTYRATLERFLIDLEQERLLDRGAPCSSEGLS 603
DB 182 -EFFANDAPALVPASIGDSVNAVGLQNVSKVHTLHHVY---HPEDVTVPGNVGTQAAA 237
QY 604 SVIVDHP 610
DB 238 AVAAHP 244

US-08-019-870-5
; Sequence 5, Application US/08019870
; Patent No. 5336613
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: YOSHIMASA, SAITO
; APPLICANT: SASAKI, HITOSHI
; APPLICANT: ISHII, YOSHINORI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 42
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: CBLON, SPIVAK, McCLELLAND, MAIER & NEUSTADT,
; STREET: 1755 S. Jefferson Davis Highway, Suite 400
; CITY: Arlington
; STATE: Virginia
; COUNTRY: U.S.A.
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.25
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/019,870
; FILING DATE: 19930219
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: Oslen, No. 5336613man F.
; REGISTRATION NUMBER: 24,618
```

REFERENCE/DOCKET NUMBER: 18-791-0
TELECOMMUNICATION INFORMATION:
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 5:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-019-870-5

Query Match 1.7%; Score 104.5; DB 1; Length 774;
Best Local Similarity 21.7%; Pred. No. 0.68;
Matches 91; Conservative 41; Mismatches 136; Indels 151; Gaps 19;
372 VAGVIGAMVSPNSA-----LYLVEVDSGWT-----AK 401
378 VPGVPGPHANGKVAICVTHAFMDIHDLYLEQFAGEGRTARFGNDFEFVAMSRDRIAV 347
402 DGGFGSFEFYQFAGPHLAANPQTDGHLVSSQSGSSNTFSVDYLA-----LI 453
348 RGGADREFDIVTRHGVIAGDP---RDGAALFLRSVQFAETDLSPCLTRMPGASHNLV 404
454 CGFGAPILLARLLFLERCDAGFTGGHGDALKVYTGTFD--SEIPCSLCEKHTRPVCAHTT 512
405 AGDVAGSIGHVTVQYLDA---TRG-----WGLIDRAVPSPRENGMLPVPWMSG 453
513 VHLR-----QMRPFQCATRQIGVPGTNSQY-----SCDPLGNVAPY----- 553
454 EHEWGWIPHEAMPR---VIDPPGGIIVTANNRVADHDHPLYLCTDCHP-----PYRAB 505
554 ---LILRKPGDQTEAAKATWQDTRATLERLFDLEQERLLDRGA--PCSEGLSSVIV- 607
506 IMKELVANPAFVDDAAAHADTLP-----HVGLLRRLEALGARDSDAEGLRQMLVA 560
608 -----DHPTFRILDTL---RARISQTTQ-----FMKVL 634
561 WDGRMDAAASEVASYNAFRALTRVDRSGLEQAISHPPFAAVAPGVSPQGVYMAVPTL 620
635 VETEDYKIRG-----LSQA-----THSWALTEPDYSGAFCP 666
621 LRDDAGMLKGSWDQALSEALSASQNLIGRSWGEHRPRFTHPLATQPPAWAGLINP 679

RESULT 23
US-08-811-519-1
Sequence 1, Application US/08811519B
Patent No. 6830345
GENERAL INFORMATION:
APPLICANT: Petrenko, Alexandre
TITLE OF INVENTION: CALCIUM INDEPENDENT RECEPTOR OF ALPHA-LATROTOXIN,
TITLE OF INVENTION: CHARACTERIZATION AND USES THEREOF
FILE REFERENCE: 1049-1-007
CURRENT APPLICATION NUMBER: US/08/811,519B
CURRENT FILING DATE: 1997-03-04
NUMBER OF SEQ ID NOS: 31
SOFTWARE: Patent In Ver. 2.0
SEQ ID NO 1
LENGTH: 1471
TYPE: PPT
ORGANISM: rat
US-08-811-519-1

Query Match 1.7%; Score 104.5; DB 4; Length 1471;
Best Local Similarity 19.6%; Pred. No. 2.3;
Matches 182; Conservative 98; Mismatches 310; Indels 339; Gaps 47;
73 LAGAGITKLTSTHFPVSVFVHGKGYLPSSAAPNITRACNAERERFGFSR-----CGGP 128
4 LAAALWSLQVTT-----VLVTSATQGLSR-----AGLPFLMRRLAGEGY 44

129 PVDGAVETTGAEICTRLGLEPENTILYLVVTALFKEAVFMCNVLHYGGGLDIYHI---NH 185
45 PIE-----LRCPGSDVIMVENANY 63
186 G-----DVIRIPLFPVQLFMPDNLVDPDPNTHRSI-----GEGFVPTFPYNTGLC 234
64 GRTDDKI CDADPPQFQENVOCYLPDAFKINSQRCNNRTQCVVWAGSDAFPPCPGTYKYL- 122
235 HLIHDCVIAPMVALRVNVTAVARGAAHLAFD-----ENHEGA-----V 274
123 EVQYDC-----VPEYKEQKVFVCPGTLQKLEPTSTHSEHQSGAMCKDPLQAGDRIYV 176
275 LP--PDITYYFQSSS-----SGTTTARGARNVDNSTSKPSFGF-----E 315
177 MWPIPYRTDILTEYASWEDYVAARHTTTTYRLNPRVD-----GTGFFVYDGAVFYK 227
316 RRLASIMAADPALH--AEVIFNTGIYEET-----PTDIK-----EWPMEIGMEGT 358
228 ERTNIVKYIDLRTRIKGETVINTANTHTDTPYWGCKTIDIDLAVDENGLWYIY-ATEGN 286
359 LPRL--NALGSYATRVAG-----VIGAMVFSFNSALYLTEVED 394
287 NGRLLVSQLNPYTLRFEGTWETGYDKRSASNAFVWCGVLYVLRVSVYVDDDDSEAAAGNRVDY 346
395 SGMTAKDGGP-----GSPNRFY-----QFAGPHLAANPQ 425
347 APTNANAREEVPVSLAFPNPYQFVSSVDYPRDNQLYVNNNVFVVRYSLEFPDPSGPA 406
426 TDRGHVLSOSTGSSNTEFSDYALICGP-GAPLLARLLFYLERCDAGFTGGHGDAL 484
407 TSPP--LSTTTARPTPLTSTASPAATPLRRAPLTHPVGAINGL-----GPD 454
485 KYVTGTFSEIPCSLCEKHTRP--VCAHTTVHRLRQMRPFGQATRP----- 530
455 PPATAPAPSTRPPAPNLFHVSPELFCBPREVRRYQWPAQOQMLVERPCPKGTGRIASFQ 514
531 ---IGVFGTWSQVSDC-DPLGNVAPVYLILRKPGDQ-----TEAAKATMODTYRATLER 580
515 CUPALGLWNPGRDPLDLSNCTSPWVQVQAKI--KSGENANATASELARHT----- 561
581 LFIDLEQERLLDRGAPCSSEGLSSVIVDHPTRILDTLRARI----- 623
562 -----RGSYAGDVSSSV-----KLMEQLLDILDAQLQALRPIRESAGKNYK 605
624 ---PQTTQPMKVLVETEDYKIR-EGI-----SEATHSMALTEPDY--SGAFCPITN 669
606 MKRERTCKDYIKAVVETVDNLLRPEALESKWMNATEQVHTATMLLDVLEBEGALLADN 665
670 -----FLVXRTHLAV-----VODLALSQCHCVFYGQVQVEGRNFR-NQFQFVLR 712
666 VREPAPFLAAKQNVVLETVLSTEGVQVQLVFPQVYASESSIQLSANTIKNSRNGVVKV 725
713 RVVDLPN--GGFISTRITVIL-----SEGVPVSAFNPTLQO-----DAPAGRTFDGDLA 759
726 VFI-LYNNLGLFLSTENATVKLAGSAGTGGGGSAGSLVNSQVIAASINKESRVE---LM 781
760 RVSVVIRDIRVKNRVFSGNCT--NLSE 786
782 DPVITVAHLEAKNH--FNANCSFWNYSE 808

RESULT 24
US-08-019-870-3
Sequence 3, Application US/08019870
Patent No. 5316613
GENERAL INFORMATION:
APPLICANT: NIWA, MINEO
APPLICANT: YOSHIMASA, SAITO
APPLICANT: SASAKI, HITOSHI
APPLICANT: ISHII, YOSHINORI
TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
NUMBER OF SEQUENCES: 42
CORRESPONDENCE ADDRESS:

ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT,
ADDRESSEE: P.C.
STREET: 1755 S. Jefferson Davis Highway, Suite 400
CITY: Arlington
STATE: Virginia
COUNTRY: U.S.A.
ZIP: 22202
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patent In Release #1.0, Version #1.25
CURRENT APPLICATION DATA: US/08/019,870
APPLICATION NUMBER: 19930219
FILING DATE: 19930219
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Oblon, No. 5336613man F.
REGISTRATION NUMBER: 24,618
REFERENCE/DOCKET NUMBER: 18-791-0
TELECOMMUNICATION INFORMATION:
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 3:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-019-870-3

Query Match 1.6%; Score 103; DB 1; Length 774;
Best Local Similarity 20.5%; Pred. No. 0.97;
Matches 143; Conservative 80; Mismatches 248; Indels 226; Gaps 37;
Qy 109 LTR--ACNAARERFGSRGCGPPVDGAVETTGAB-ICTR----LGLEPENTILYLVVTL 161
Db 70 LTRKALGRAEWLG---AEAARADILVRMGKVCRRDFEALGVEAKD-----M 117
Qy 162 FKEAVFMCNVLHYGGDLIVHINHGDIPIPLFVQLFMPDVNRLVDPDPNTH-----R 216
Db 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAE---PEPWEPMHSTAVMR 159
Qy 217 SIGEGFVPTFPYNTGLCHLHDCVIAPIAVALVRNVTAV----ARGAAHLAFDENHEG 272
Db 160 RLG-----LMGWFVFLKWLRLALPVVGAANALKRYDDGGRD 197
Qy 273 AV-LPPDITYTFOSSSGTTTARGARRNDVNSTKPSGGFER-----RLAS----IM 322
Db 198 LLCIPPGAERDRLEADLATLRPAVDALLKAMGDSADAAAGGSNNWAVAPGRTATGPIL 257
Qy 323 AADTALHAEVITGIVEETPTDIKEWPMFTGMEGTLPRNLALGSIYARVAGVIGAMVFS 382
Db 258 AGDPRHVFEEI---PGWVAQHHLACDRFDM-IGL--TVPGVGFPHFAHN-----GRVAYS 306
Qy 383 PNSA-----LYLTVEDSGMTE-----AKDGGPGPSFNRVYQAFGPHL 420
Db 307 VTHAFMDIHLVLEQFAGEGTARFGNDPEFVANSRDIARVGGADREFDIVETRHGPIV 366
Qy 421 AANFQTRDGHVLSQSQTGSSNTSFSDVYDALICGFGAPLARLLFYLERCDACAGFTG-- 478
Db 367 AGDP---RDGAALTILRSVQFAETDLSFDCLTRMP--GASTVAQLY-----DATRGWGLI 415
Qy 479 GH---GDALKXVTGTDFSEIPCSICEKHTRPVCAHTIVHRLR-----QRMPEFGQATRQ 529
Db 416 DHNLVAGDVAGSIGHLVARVPSPRENGWLPVPGWSEGEHWGWIPEAMPR---VIDP 472
Qy 530 PIGVFGTMSQY-----SDCDPLGNVAPY-----LILRKGSDQTEAKATQD 572
Db 473 EGGIIVTANNRVADDDHFDYLCITDCHP-----PYRAERIMKRLVANPAFAVDAAAIHAD 527
Qy 573 TYRATLERLFDLEQERLLDRGA--PCSSSEGLSSVIV-----DHTFEREIL 616

Db 528 TLSP-----HVGLLRRLLEALGARDSDSAREGLRQMLVANDGMDAASEVAYNAFRAL 582
Qy 617 DTL---RARIEQTITQ-----FMKVLVETRDYKIRG-----LSEA- 649
Db 583 TRLVTRDSGLEAISHPEAAVAPGVSPQGVWVAVPTLLRDDDDAGMLKGWSWDQALSEAL 642
Qy 650 -----THSMALTDFDPYSGAFCP 666
Db 643 SVASQNLTRGSWGEHRPRFTHPLATQPPAWAGLLNP 679
RESULT 25
US-08-633-760-44
Sequence 44, Application US/08633760
Patent No. 5804429
GENERAL INFORMATION:
APPLICANT: NIWA, MINEO
APPLICANT: SAITO, YOSHIMASA
APPLICANT: FUJIMURA, TAKAO
APPLICANT: ISHII, YOSHINORI
APPLICANT: NOGUCHI, YUJI
TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
NUMBER OF SEQUENCES: 64
CORRESPONDENCE ADDRESS:
ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT,
STREET: 1755 JEFFERSON DAVIS HIGHWAY, SUITE 400
CITY: ARLINGTON
STATE: VIRGINIA
COUNTRY: USA
ZIP: 22202
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patent In Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/633,760
FILING DATE: 01-MAY-1996
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: OBLON, NORMAN F.
REGISTRATION NUMBER: 24,618
REFERENCE/DOCKET NUMBER: 18-929-0 PCT
TELECOMMUNICATION INFORMATION:
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 44:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-633-760-44
Query Match 1.6%; Score 103; DB 1; Length 774;
Best Local Similarity 20.6%; Pred. No. 0.97;
Matches 145; Conservative 77; Mismatches 241; Indels 242; Gaps 37;
Qy 109 LTR--ACNAARERFGSRGCGPPVDGAVETTGAB-ICTR---LGLEPENTILYLVVTL 161
Db 70 LTRKALGRAEWLG---AEAARADILVRMGKVCRRDFEALGVEAKD-----M 117
Qy 162 FKEAVFMCNVLHYGGDLIVHINHGDIPIPLFVQLFMPDVNRLVDPDPNTH-----R 216
Db 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAE---PEPWEPMHSTAVMR 159
Qy 217 SIGEGFVPTFPYNTGLCHLHDCVIAPIAVALVRNVTAV----ARGAAHLAFDENHEG 272
Db 160 RLG-----LLAGSVWFLKWLRLALPVVGAANALKRYDDGGRD 197

QY 273 AV-LPPDIITYYFQSSSSGTTTARGARRNDVNSTSKPSPSGGFER-----RLAS-----IM 322
DB 198 LLCIPFGAEADRLADLRLPAVDALLKAMGGDADAAGGSNNWAVAGTATGRFIL 257
QY 323 AADTALHAENVIENTIGYEETPTDIKEWPMFIGMEGTLPRNLALGYSYARVAGVIGAMVFS 382
DB 258 AGDPHRVFEI---PGNYAQHLLACDFDM-IGL--TVP-----GVPGFPHFA 298
QY 383 PNSA-----LYLVEVDSGME-----AKDGGFGSFRNF 412
DB 299 HNGKVAYCVTHAPMDTHDLYLEQFAGEGRTARFGNDFFPVAMSRDRIVRGADREFDIV 358
QY 413 YQFAGPHLANPOTDRDGHVLSQSSTNTSFDVYDALICGFGAPILARLLFYLERCD 472
DB 359 ETRHGVIAGDP---RDGAALTURSVOFRETDLSPCLTRMP--GASTVAQIY-----D 407
QY 473 AGAFTG--GH-----GDALYVVTGTDFSEIPCSCKEKTRPVCAHTTVHRLR-----QRP 521
DB 408 ATRGWLGLDNLVAGDVAGSIGHLVARVPSRPRENGMLVPVGSGEHEWRGWIPIHEAMP 467
QY 522 RFQATROPFIGVGTWNSQY-----SCDPLGNVAPY-----LILRKCDQTE 564
DB 468 R---VIDPPGGIIVTANNRVVADDDHPDYLCCTDCHP-----PYAERIMKRLVANPAFVD 519
QY 565 AAKATWQDTVRATLERLFDLEQERLLDRGA--PCSSSEGLSSVIV-----D 608
DB 520 DAAAIHADTLSP-----HVGLLRRLLEALGARDDSAEGLRQMLVAMVMDGRMDAASEVASA 574
QY 609 HPTFRILDTL---RARIETQTTQ-----FMKVLVETRDYKIREG--- 645
DB 575 YNAFRALTRLVTDRLSGLQEAISHPFAAVAGVSPQGVQVWVAVPTLLRDDDAGMLKGSW 634
QY 646 ---LSEA-----THSMALTFDPYSGAFCP 666
DB 635 DQALSEALSVAONLTGRSWGEBHRPRTPLATQFPANAGLNP 679

RESULT 26
US-09-408-020-4
; Sequence 4, Application US/09408020
; Patent No. 8632937
; GENERAL INFORMATION:
; APPLICANT: Swanson, Ronald V.
; APPLICANT: Feldman, Robert A.
; APPLICANT: Schleper, Christa
; TITLE OF INVENTION: NUCLEIC ACIDS AND PROTEINS FROM CENARCHAEUM SYMBIOSUM
; FILE REFERENCE: DCOIP.002A
; CURRENT APPLICATION NUMBER: US/09/408,020
; PRIOR FILING DATE: 1999-09-29
; PRIOR FILING DATE: 1998-09-29
; NUMBER OF SEQ ID NOS: 123
; SOFTWARE: FastSeq for Windows Version 3.0
; SEQ ID NO 4
; LENGTH: 3472
; TYPE: PRP
; ORGANISM: Cenarchaeum symbiosum
US-09-408-020-4

Query Match 1.6%; Score 103; DB 4; Length 3472;
Best Local Similarity 20.2%; Pred. No. 16;
Matches 98; Conservative 51; Mismatches 175; Indels 160; Gaps 24;

QY 82 LTTGHFYPSVFVFGHKHVLFPSSAAPNLTRACNARERFGSRQCPVPVGVAVETTGAEI 141
DB 928 LAVSGYAEPSLVF--GRHVPGAAGTFFPSQIGNATELVG--SIPNPTLDFGTLTGA-- 981
QY 142 CTRGLGEPENTILYLVNTALFKEAVFMCNVLHY-----GGLDIVHNGHDVIRIPLFPV 196
DB 982 ----AFSADGTVFVLSOGPTGRVTPYSINLPFDISSAAPGCVIIVPGVSDI----- 1029
QY 197 QLMPED-VNRLVPPDPFNTHRSISGEG-FVYPTPTFYNTGLCHLHDCVIAPMVALRVNV 254

DB 1030 -AFSADGRNMLVADETGGIHRYLARGSPYEIGTDFIKSSSLGEFVETFSAP-----RVQDL 1083
QY 255 TAVARGAAHLAFENHEGAVLPFDIITYYFQSSSSGTTTARGARRNDVNSTSKPSP--S 311
DB 1084 AGIA-----FSDGMM-----LAAGSGS-----VHYSILSPSYAVS 1116
QY 312 G-----GFE-----RRLASIMAAADTALHAENVIFNTGIYEBTPTDIKEWPM 351
DB 1117 GAKYEETAMIGSSPSGLEFSSDGLRMPVPDAGSETAAVYGLAAPYGIGEAEPILP---PL 1172
QY 352 FIGM--EGTL-----PRNLALGYSY-----ARVAGVIGAMVSPNSALYLT 390
DB 1173 FLGVGABEATLSPDRHILVPGRGLSQYSLFSTNLLELCAEPRGIDGG-----SCEDGIYAF 1229
QY 391 EVEDSG---MTEAKDGGPGSFRNFYQFAGPHLAA----- 422
DB 1230 ESPRGEGCVSLAASITAADGPGIGELHGFAGPMPAPVMSQVTLDSREGTLRVRLDRTVD 1289
QY 423 ----NPQ-----TDRGHVLSQSSTNTSFDVYDALICGFGAPILARLLFYLERCDAG 474
DB 1290 VDTVRPYKMWVEDSDG-----SQTLANSTLINAENSNI-----LLFLRDDAAAG 1334
QY 475 AFTG 478
DB 1335 KISG 1338

RESULT 27
US-08-070-165F-6
; Sequence 6, Application US/08070165F
; Patent No. 5750365
; GENERAL INFORMATION:
; APPLICANT: Chiu, Ing-Ming
; APPLICANT: Poulin, Matthew L
; TITLE OF INVENTION: Acidic Fibroblast Growth Factor (aFGF)
; NUMBER OF SEQUENCES: 12
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: Ing-Ming Chiu
; STREET: S2052 Davis Medical Research Center, 480 West
; STREET: 9th Avenue
; CITY: Columbus
; STATE: Ohio
; COUNTRY: USA
; ZIP: 43210
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent In Release #1.0, Version #1.25
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/070,165F
; FILING DATE:
; CLASSIFICATION: 435
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (614)-293-8093
; TELEFAX: (614)-293-5631
; INFORMATION FOR SEQ ID NO: 6:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 729 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
US-08-070-165F-6

Query Match 1.6%; Score 102; DB 1; Length 729;
Best Local Similarity 20.0%; Pred. No. 1.1; 206; Indels 168; Gaps 26;
Matches 111; Conservative 69; Mismatches 168;

QY 355 MBGTLPRNLALGYSYARVAGVIGAMVSPNSALYLTVEVDS-----GMTAKDG 403
DB 128 MESVVP--SDGNYTCIMENEVGS!---NHTYHLDVVRSRHRPILOAGLPANTTTKVG 181
QY 404 GPCPSFRNFYQFAGPHL-----NANPQTDGDGH-----VLSQSQTGSNTSFDVYDAL 452

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Db 182 GDAEFVCKYSDAQPHQIOWRHPFELNGSKIGDPGHPYLVKLAAGVNTDKIEIVLYRN 241
Qy 453 ICDFGAPLLARLLPYLERCDAGFT--GGHGDAKLYVTGTF-----DSEIPCS----- 498
Db 242 VS-----DSEIPCS-----DSEIPCS-----DSEIPCS-----DSEIPCS----- 286
Qy 499 -----DSEIPCS-----DSEIPCS-----DSEIPCS-----DSEIPCS----- 527
Db 287 AIYCVGGFLITCIGIMVCHMKGRKXGDFSPFPAVHKLKSLPLRQVTVSADSSSM 346
Qy 528 --RQPGVFTWMSQVSDCDPLGNAPY-----LILRKP-GD----- 561
Db 347 NSNTPLVRIITRLLSSNNDTHLLAGVSEYELPEDPKWYPREKLTGLKPLGCGFCQVWMA 406
Qy 562 -----QTEAAKATMDTYRATLERLFDLEQERLLDR-----GAPCSSE 600
Db 407 EAVGIDKDRPKDAATVAVKMLKDDATEKDLSDLVSEMEMMKMGKHKNIINLLGA-CTQD 465
Qy 601 GLSSVIVDHT---FRILDTLRLARIEOTTQTMKVLVETRYKIREGLSEATHSMALTF 657
Db 466 GPLVIVVEYASKGNLREYLTRPPGMEYSFDINRIPEQMTFK---DIVSCYQLARGM 522
Qy 658 DPGSGAPC-----PITNFLVKRTHLAVVODLALSO--CHCVFYGOQVGRNFRNQFQVL 710
Db 523 EYLASQKCHRDLAARNVLVTETNWKIADFLGARDINNIDYKKTNGR-----LPVK 576
Qy 711 RRRFVDFNGGFTSTRISITVLSGFPVSAPNPTLGDAPAGRTFGDLARVSV-EVIRDI 769
Db 577 WMAPEALFDRVYTHQSDV---WSFGVLMWEIFTLG-----GSPYFG-----IPVELFKLL 624
Qy 770 RVKNRVVFGNCTN 783
Db 625 KEGRMDKPGNCTN 638

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RESULT 28
US-08-885-418-6
; Sequence 6, Application US/08885418
; Patent No. 5925528
; GENERAL INFORMATION:
; APPLICANT: Chiu, Ing-Ming
; APPLICANT: Poulin, Matthew L
; TITLE OF INVENTION: Acidic Fibroblast Growth Factor (aFGF)
; NUMBER OF SEQUENCES: 12
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: Ing-Ming Chiu
; STREET: 52052 Davis Medical Research Center, 480 West
; CITY: Columbus
; STATE: Ohio
; COUNTRY: USA
; ZIP: 43210
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent Release #1.0, Version #1.25
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/885,418
; FILING DATE:
; CLASSIFICATION: 435
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (614)-293-8093
; TELEFAX: (614)-293-5631
; INFORMATION FOR SEQ ID NO: 6:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 729 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
US-08-885-418-6

```

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Query Match 1.6%; Score 102; DB 2; Length 729;
Best Local Similarity 20.0%; Pred. No. 1.1; Mismatches 69; Indels 168; Gaps 26;
Matches 111; Conservative
Qy 355 MEGTLPRNLALSGYARVAGVIGAMVFPNSALYLTEVEDS-----GMTAKDG 403
Db 128 MESWVP--DSENYTCIMENEYSSI---NHTYHLDVVERSPHRPILOAGLPANTTTKVG 181
Qy 404 GPSPFNRYQFAGPHL-----AANQTDHDDH-----VLSSQSGSSNTEFSDYLAL 452
Db 182 GDAEFVCKYSDAQPHQIOWRHPFELNGSKIGDPGHPYLVKLAAGVNTDKIEIVLYRN 241
Qy 453 ICDFGAPLLARLLPYLERCDAGFT--GGHGDAKLYVTGTF-----DSEIPCS----- 498
Db 242 VS-----DSEIPCS-----DSEIPCS-----DSEIPCS-----DSEIPCS----- 286
Qy 499 -----DSEIPCS-----DSEIPCS-----DSEIPCS-----DSEIPCS----- 527
Db 287 AIYCVGGFLITCIGIMVCHMKGRKXGDFSPFPAVHKLKSLPLRQVTVSADSSSM 346
Qy 528 --RQPGVFTWMSQVSDCDPLGNAPY-----LILRKP-GD----- 561
Db 347 NSNTPLVRIITRLLSSNNDTHLLAGVSEYELPEDPKWYPREKLTGLKPLGCGFCQVWMA 406
Qy 562 -----QTEAAKATMDTYRATLERLFDLEQERLLDR-----GAPCSSE 600
Db 407 EAVGIDKDRPKDAATVAVKMLKDDATEKDLSDLVSEMEMMKMGKHKNIINLLGA-CTQD 465
Qy 601 GLSSVIVDHT---FRILDTLRLARIEOTTQTMKVLVETRYKIREGLSEATHSMALTF 657
Db 466 GPLVIVVEYASKGNLREYLTRPPGMEYSFDINRIPEQMTFK---DIVSCYQLARGM 522
Qy 658 DPGSGAPC-----PITNFLVKRTHLAVVODLALSO--CHCVFYGOQVGRNFRNQFQVL 710
Db 523 EYLASQKCHRDLAARNVLVTETNWKIADFLGARDINNIDYKKTNGR-----LPVK 576
Qy 711 RRRFVDFNGGFTSTRISITVLSGFPVSAPNPTLGDAPAGRTFGDLARVSV-EVIRDI 769
Db 577 WMAPEALFDRVYTHQSDV---WSFGVLMWEIFTLG-----GSPYFG-----IPVELFKLL 624
Qy 770 RVKNRVVFGNCTN 783
Db 625 KEGRMDKPGNCTN 638

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RESULT 29
US-07-747-901A-3
; Sequence 3, Application US/07747901A
; Patent No. 5192678
; GENERAL INFORMATION:
; APPLICANT: Iwami, Morita
; APPLICANT: Aramori, Ichiro
; APPLICANT: Fukagawa, Masao
; APPLICANT: Isogai, Takao
; APPLICANT: Kojo, Hitoshi
; TITLE OF INVENTION: CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 3
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCLELLAND, MAIER & NEUSTADT,
; ADDRESSEE: P.C.
; STREET: 1755 Jefferson Davis Highway, Fourth Floor
; CITY: Arlington
; STATE: Virginia
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent Release #1.0, Version #1.25
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/07/747,901A
; FILING DATE: 19910820
; CLASSIFICATION: 435

```

```

;
; ATTORNEY/AGENT INFORMATION:
; NAME: Oblon, No. 5192678man F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-709-0
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703)521-4500
; TELEFAX: (703)486-2347
;
; NUMBER OF SEQUENCES: 3
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCLELLAND, MAIER & NEUSTADT,
; STREET: 1755 Jefferson Davis Highway, Fourth Floor
; CITY: Arlington
; STATE: Virginia
; ZIP: 22202
;
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.25
;
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/07/935,312
; FILING DATE: 19920826
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: Oblon, No. 5320948man F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-769-0 DIV
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703)521-4500
; TELEFAX: (703)486-2347
;
; INFORMATION FOR SEQ ID NO: 3:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 774 amino acids
; TYPE: AMINO ACID
; TOPOLOGY: linear
; MOLECULE TYPE: protein
;
; US-07-935-312-3
;
; Query Match 1.6%; Score 102; DB 1; Length 774;
; Best Local Similarity 20.6%; Pred. No. 1.2;
; Matches 145; Conservative 77; Mismatches 241; Indels 242; Gaps 37;
;
; QY 109 LTR--ACNAAREPFGSRCCGPPVDGAVETTGAE--ICTR-----LGLPEPNTILYLVTAL 161
; DB 70 LTRRKALGRAAEWLG---AEAADILVRLGMEKVCRRDPEALGVEAKD-----M 117
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; QY 162 FKEAVFMCNVFLHYGGLDIVHINHGDIIRIPFVQLFMPDVNRLVDPDFNTH-----R 216
; DB 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAE---PEPEPWHSIAMVR 159
;
; QY 217 SIGEGFVYPTFPYNTGLCHLIHDCVIAPMVALRVNVTAV-----ARGAAHLAFDENHEG 272
; DB 160 RLG-----LLMGSVWFKLWRMLALPVVGAANALKLRYDDGGRD 197
;
; QY 273 AV-LPPDITYTYFOSSSGTTTARGARNVDNSTKPSGSGFER-----RLAS---IM 322
; DB 198 LLCIPGAEADRLADLTPAPVDALLKAMGGDASDAAGGSNNWAVAPGTATGRPIL 257
;
; QY 323 AADTALHAEIFNTGIYEETPTDIKEWPMFIGMEGTLPRLNALGYSYARVAGVIGAMVFS 382
; DB 258 AGDPHRVFEI---PGMYAQHHLACDRFDM--IGL--TVP-----GVPGFPHEFA 298
;
; QY 383 PNSA-----LYLTVEDSGMTE-----AKDGGPSPFNRF 412
; DB 299 HNGKVAYCVTHAFMDIHDLYLEQFAGEGRTARFGNDFPVAWSRRIARVGGADREFDIV 358
;
; QY 413 YQFAGPHLAANPQTDORGDHVLSSQSTGSSNTFSVDYLALICGFGAPLARLLFYLERCD 472
; DB 359 ETRHGPVIAGDP---RDGAULTLSRVQFAETDLSFDCLTRMP--GASTVAQLY-----D 407
;
; QY 473 AGAFTG--GH-----GDALKYVTGTDFDSEIPCSLCEKHTRPVCAHTTVHRLR-----QRMP 521
; DB 408 ATRGWGLIDHNLVAGDVAGSIGHLVRAVRPSPRENGWLFVPGWSGSEHEWRGWIPIHEAMP 467
;
; QY 522 RFGQATQPIGVFGTMNSOY-----SDCDPLGNVAPY-----LILRKPGDQTE 564
; DB 468 R---VIDPPGGIIVTANNRVVADHDHDPYLCCTDCHP-----PYRAERIMKELVANPAPAVD 519
;
; QY 565 AAKATMDQTYRATLERLFDLEQERLLDRGA--PCSSEGLSSVIV-----D 608
; DB 520 DAAAIHADTLSP-----HVGLLRRLREALGARDSDAAEGLRQMLVAMWGRMDAASEVASA 574
;
; QY 609 HPTFRRLDITL---RAIEQTTQ-----FMKVLVETDYKIREG--- 645
; DB 575 YNAPFRALTRLVTRDSGLEQAISHPFAAVPAGVSPQGVNVAWPTLLRDDDAGMLKGNWSW 634
;
; QY 646 ---LSEA-----THSMALTDPYSGAFCP 666
; DB 635 DQALSEALSVASQNLTRSGMGEERHPRFTTHPLATQFFAWAGLLNP 679
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; RESULT 30
; US-07-935-312-3
; Sequence 3, Application US/07935312
; Patent No. 5320948

```

```

;
; GENERAL INFORMATION:
; APPLICANT: Iwami, Morita
; APPLICANT: Aramori, Ichiro
; APPLICANT: Fukagawa, Masao
; APPLICANT: Isogai, Takao
; APPLICANT: Kojo, Hitoshi
; TITLE OF INVENTION: CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 3
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCLELLAND, MAIER & NEUSTADT,
; STREET: 1755 Jefferson Davis Highway, Fourth Floor
; CITY: Arlington
; STATE: Virginia
; ZIP: 22202
;
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.25
;
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/07/935,312
; FILING DATE: 19920826
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: Oblon, No. 5320948man F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-769-0 DIV
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703)521-4500
; TELEFAX: (703)486-2347
;
; INFORMATION FOR SEQ ID NO: 3:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 774 amino acids
; TYPE: AMINO ACID
; TOPOLOGY: linear
; MOLECULE TYPE: protein
;
; US-07-935-312-3
;
; Query Match 1.6%; Score 102; DB 1; Length 774;
; Best Local Similarity 20.6%; Pred. No. 1.2;
; Matches 145; Conservative 77; Mismatches 241; Indels 242; Gaps 37;
;
; QY 109 LTR--ACNAAREPFGSRCCGPPVDGAVETTGAE--ICTR-----LGLPEPNTILYLVTAL 161
; DB 70 LTRRKALGRAAEWLG---AEAADILVRLGMEKVCRRDPEALGVEAKD-----M 117
;
; QY 162 FKEAVFMCNVFLHYGGLDIVHINHGDIIRIPFVQLFMPDVNRLVDPDFNTH-----R 216
; DB 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAE---PEPEPWHSIAMVR 159
;
; QY 217 SIGEGFVYPTFPYNTGLCHLIHDCVIAPMVALRVNVTAV-----ARGAAHLAFDENHEG 272
; DB 160 RLG-----LLMGSVWFKLWRMLALPVVGAANALKLRYDDGGRD 197
;
; QY 273 AV-LPPDITYTYFOSSSGTTTARGARNVDNSTKPSGSGFER-----RLAS---IM 322
; DB 198 LLCIPGAEADRLADLTPAPVDALLKAMGGDASDAAGGSNNWAVAPGTATGRPIL 257
;
; QY 323 AADTALHAEIFNTGIYEETPTDIKEWPMFIGMEGTLPRLNALGYSYARVAGVIGAMVFS 382
; DB 258 AGDPHRVFEI---PGMYAQHHLACDRFDM--IGL--TVP-----GVPGFPHEFA 298
;
; QY 383 PNSA-----LYLTVEDSGMTE-----AKDGGPSPFNRF 412
; DB 299 HNGKVAYCVTHAFMDIHDLYLEQFAGEGRTARFGNDFPVAWSRRIARVGGADREFDIV 358
;
; QY 413 YQFAGPHLAANPQTDORGDHVLSSQSTGSSNTFSVDYLALICGFGAPLARLLFYLERCD 472
; DB 359 ETRHGPVIAGDP---RDGAULTLSRVQFAETDLSFDCLTRMP--GASTVAQLY-----D 407
;
; QY 473 AGAFTG--GH-----GDALKYVTGTDFDSEIPCSLCEKHTRPVCAHTTVHRLR-----QRMP 521

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408 ATRGWLIDHNLVAGDVAGSIGHLVRVPSRPRENGWLPVPGWSGEHWRGMPHEAMP 467
QY 522 RFGQATROPIGVFGTMSQY-----SDCDPLGNYAPY-----LILKPGDQTE 564
Db 468 R---VIDPPGGIIVTANNRVVADDDHPDYLCTDCHP-----PYRAERIMKRLVANPAFAVD 519
QY 565 AAKATMODTYRATLERLFDLEQERLLDRGA--PCSEGLSSVIV-----D 608
Db 520 DAAIAHADTLSP-----HVGLLRRLEALGARDSDAAGLEQLMVLVANDGRMDAASEVASA 574
QY 609 HPTFRILDTL---RARIEQTTQ-----FMKVLVETRDYKIREG--- 645
Db 575 YNAFERALTRIVTRDSGLEQAISHPFAAFAVGVSPQGVWMAVPTLLRDDDAGMLKQMSW 634
QY 646 ---LSEA-----THSMALTFDPYSGAFCP 666
Db 635 DQALSEALSVASQNLTRGSRWGEHRPRFTHPLATQFFAWAGLLNP 679

RESULT 31
US-08-633-760-50
; Sequence 50, Application US/08633760
; Patent No. 5804429
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: SAITO, YOSHIMASA
; APPLICANT: FUJIMURA, TAKAO
; APPLICANT: ISHII, YOSHINORI
; APPLICANT: MCGUCHI, YUJI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 64
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT,
; ADDRESSEE: P.C.
; STREET: 1755 JEFFERSON DAVIS HIGHWAY, SUITE 400
; CITY: ARLINGTON
; STATE: VIRGINIA
; COUNTRY: USA
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.30
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/633,760
; FILING DATE: 01-MAY-1996
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: OBLON, NORMAN F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-929-0 PCT
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703) 413-3000
; TELEFAX: (703) 413-2220
; TELEX: 248955 OPAT UR
; INFORMATION FOR SEQ ID NO: 50:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 774 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
US-08-633-760-50

Query Match 1.6%; Score 102; DB 1; Length 774;
Best Local Similarity 21.2%; Pred. No. 1.2;
Matches 149; Conservative 73; Mismatches 243; Indels 238; Gaps 39;
QY 109 LTR--ACNAAREFCRQCGPPVDGAVETTGAE-ICTR-----LGLEPENTILVVTAL 161
Db 70 LTRKALGRAAEWUG---AEEAEDILVRLGMEKVCRRDFEALGVKAKD-----M 117

QY 162 FKEAVFMCNVLPHYGLDIVHINHGDIVIRIPLFPVQLFMPDVNRLVPPDFNTH-----R 216
Db 118 LRAYVAGVNAFLASGA-----PL-PVEYGLLGAE--PEWEPWHSIAVMR 159
QY 217 STGEGFVYPTFYNTGLCHLIHDCVIAFM--AVALARVNRVTAVARCAHLADENHEGAV 274
Db 160 RLG-----LLGSVNFKLWRLALFV-----VGAANALKRLXDDGGRDLL 199
QY 275 -LPPDITYTYFSSSGTITARGARRNDVNSTKSPSGGFER-----RLAS---IMAA 324
Db 200 CIPPGAEDRLADLATLRPAVDALLKAMGGDASDAAGGSNNWAVAPGRTATGRILAG 259
QY 325 DIALHAEVFNTGIVETPTDIKEWPMFIMGSTIPLRNALGSYTRAVAGVIGAMVFSN 384
Db 260 DPHRVPEI---PYVAQHHLACDRFDM-IGL--TVP-----GVPGFPFHAHN 300
QY 385 SA-----LYLVEVDSQMT-----AKDGGPGPSFNRFYQ 414
Db 301 GKVAVCVTHAFMDIHDLYLEQFAGEGRTARFGNDPEPVAWSRDRITAVRGADREFDIVET 360
QY 415 FAGPHLAANPQTRDGHVLSQSSTNTSFVDYLALICGFGAPLLARLLFYLERCDAG 474
Db 361 RHGPFVIAGDP---RDGAULTRSVQPAETDLSFDCLTRMP--GASTVAQLY-----DAT 409
QY 475 AFTG--GH-----GDALKYVTGTFDSEIPCSCLEKHTRPVCAHTTVHRLR-----QSMRPF 523
Db 410 RMGLIDHNLVAGDVAGSIGHLVRVPSRPRENGWLPVPGWSGEHWRGMPHEAMP-- 468
QY 524 GOATROPIGVFGTMSQY-----SDCDPLGNYAPY-----LILKPGDQTEAA 566
Db 469 --VIDPPGGIIVTANNRVVADDDHPDYLCTDCHP-----PYRAERIMKRLVANPAFAVDDA 521
QY 567 KATMODTYRATLERLFDLEQERLLDRGA--PCSEGLSSVIV-----DHP 610
Db 522 AAIAHADTLSP-----HVGLLRRLEALGARDSDAAGLEQLMVLVANDGRMDAASEVASAYN 576
QY 611 TFRILDTL---RARIEQTTQ-----FMKVLVETRDYKIREG----- 645
Db 577 AFRAALTRIVTRDSGLEQAISHPFAAFAVGVSPQGVWMAVPTLLRDDDAGMLKQMSWDQ 636
QY 646 -LSEA-----THSMALTFDPYSGAFCP 666
Db 637 ALSEALSVASQNLTRGSRWGEHRPRFTHPLATQFFAWAGLLNP 679

RESULT 32
US-08-019-870-1
; Sequence 1, Application US/08019870
; Patent No. 5336613
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: YOSHIMASA, SAITO
; APPLICANT: SASAKI, HITOSHI
; APPLICANT: ISHII, YOSHINORI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 42
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT,
; ADDRESSEE: P.C.
; STREET: 1755 S. Jefferson Davis Highway, Suite 400
; CITY: Arlington
; STATE: Virginia
; COUNTRY: U.S.A.
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patent in Release #1.0, Version #1.25
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/019,870
; FILING DATE: 19930219
; CLASSIFICATION: 435

```
; ATTORNEY/AGENT INFORMATION:
; NAME: Obion, No. 5336613man F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-791-0
; TELEPHONE: (703) 413-3000
; TELEFAX: (703) 413-2220
; TELEX: 248855 OPAT UR
; INFORMATION FOR SEQ ID NO: 1:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 773 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; US-08-019-870-1

Query Match 1.6%; Score 101.5; DB 1; Length 773;
Best Local Similarity 21.9%; Pred. No. 1.4;
Matches 91; Conservative 41; Mismatches 139; Indels 145; Gaps 19;

QY 372 VAGVIGAMVFPNSA-----LYLVEVDSGMT-----AK 401
Db 287 VGVPGPPHFAHNGKVAYCVTHAFMDIHDLYLEQPAGEGRTARFGNDFPVAWSRDRIAV 346
QY 402 DGGPGSPFNRFYQFAGPHLAANPQTRDGHVLSQSTGSSNTEFSVDYLALICGFGAPLL 461
Db 347 RGGADREFDIVEVRHGFVIAGDP---RDGAALTLSVQFAETDLSFDCLTRMP--GASTV 401
QY 462 ARLLFYLERCDAGFTG--GH-----GDALKYVTGTFDSEIPCSLCEKHTRPVCAHTTVHR 515
Db 402 AQLY-----DATRGWGLIDHNLVAGDVAGSIGHLVRAVPSPRPNGLVPVPGWSGEHE 455
QY 516 LR-----QRMPRFGQATROPIGVFGTNSQY-----SDCDPLGNVAPY----- 553
Db 456 WRGWIPHEAMPR---VIDPPGGIIVTANNRVVADHDYDLCTDCHP-----PYRAERIMK 507
QY 554 LILRKPGQTEAAKATQDVTYRATLERLFDLQERLLDRGA--PCSSGLSSVIV--- 607
Db 508 RLVANPAFAVDAAAIHADTLSP-----HVGLRRLEALGARDSDAAEGLRQMLVWDG 562
QY 608 -----DHPTFRRLDTL---RARIQTTTQ-----FMKVLVET 637
Db 563 RMDAASEVASAYNAFRALTRLVTDRLSGLEQAISHPPAAVAPGVSPQGVWVAVPTLLRD 622
QY 638 RDKIREG-----LSEA-----THSMALTFDPYSGAFCP 666
Db 623 DDAGMLKGWSWDQALSEALSASQNLTRSGWGEHRPRFTHTPLATQFPWAGLLNP 678

RESULT 33
US-08-019-870-6
; Sequence 6, Application US/08019870
; Patent No. 5336613
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: YOSHIMASA, SAITO
; APPLICANT: SASAKI, HITOSHI
; APPLICANT: ISHII, YOSHINORI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 42
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: P.C.
; STREET: 1755 S. Jefferson Davis Highway, Suite 400
; CITY: Arlington
; STATE: Virginia
; COUNTRY: U.S.A.
; ZIP: 22202
; COMPUTER READABLE FORM:
; MEDIUM TYPE: Floppy disk
; COMPUTER: IBM PC compatible
; OPERATING SYSTEM: PC-DOS/MS-DOS
; SOFTWARE: Patentin Release #1.0, Version #1.25
```

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; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/08/019,870
; FILING DATE: 19930219
; CLASSIFICATION: 435
; ATTORNEY/AGENT INFORMATION:
; NAME: Obion, No. 5336613man F.
; REGISTRATION NUMBER: 24,618
; REFERENCE/DOCKET NUMBER: 18-791-0
; TELECOMMUNICATION INFORMATION:
; TELEPHONE: (703) 413-3000
; TELEFAX: (703) 413-2220
; TELEX: 248855 OPAT UR
; INFORMATION FOR SEQ ID NO: 6:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 773 amino acids
; TYPE: amino acid
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; US-08-019-870-6

Query Match 1.6%; Score 101.5; DB 1; Length 773;
Best Local Similarity 21.9%; Pred. No. 1.4;
Matches 91; Conservative 41; Mismatches 139; Indels 145; Gaps 19;

QY 372 VAGVIGAMVFPNSA-----LYLVEVDSGMT-----AK 401
Db 287 VGVPGPPHFAHNGKVAYCVTHAFMDIHDLYLEQPAGEGRTARFGNDFPVAWSRDRIAV 346
QY 402 DGGPGSPFNRFYQFAGPHLAANPQTRDGHVLSQSTGSSNTEFSVDYLALICGFGAPLL 461
Db 347 RGGADREFDIVEVRHGFVIAGDP---RDGAALTLSVQFAETDLSFDCLTRMP--GASTV 401
QY 462 ARLLFYLERCDAGFTG--GH-----GDALKYVTGTFDSEIPCSLCEKHTRPVCAHTTVHR 515
Db 402 AQLY-----DATRGWGLIDHNLVAGDVAGSIGHLVRAVPSPRPNGLVPVPGWSGEHE 455
QY 516 LR-----QRMPRFGQATROPIGVFGTNSQY-----SDCDPLGNVAPY----- 553
Db 456 WRGWIPHEAMPR---VIDPPGGIIVTANNRVVADHDYDLCTDCHP-----PYRAERIMK 507
QY 554 LILRKPGQTEAAKATQDVTYRATLERLFDLQERLLDRGA--PCSSGLSSVIV--- 607
Db 508 RLVANPAFAVDAAAIHADTLSP-----HVGLRRLEALGARDSDAAEGLRQMLVWDG 562
QY 608 -----DHPTFRRLDTL---RARIQTTTQ-----FMKVLVET 637
Db 563 RMDAASEVASAYNAFRALTRLVTDRLSGLEQAISHPPAAVAPGVSPQGVWVAVPTLLRD 622
QY 638 RDKIREG-----LSEA-----THSMALTFDPYSGAFCP 666
Db 623 DDAGMLKGWSWDQALSEALSASQNLTRSGWGEHRPRFTHTPLATQFPWAGLLNP 678

RESULT 34
US-08-019-870-8
; Sequence 8, Application US/08019870
; Patent No. 5336613
; GENERAL INFORMATION:
; APPLICANT: NIWA, MINEO
; APPLICANT: YOSHIMASA, SAITO
; APPLICANT: SASAKI, HITOSHI
; APPLICANT: ISHII, YOSHINORI
; TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
; NUMBER OF SEQUENCES: 42
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: P.C.
; STREET: 1755 S. Jefferson Davis Highway, Suite 400
; CITY: Arlington
; STATE: Virginia
; COUNTRY: U.S.A.
; ZIP: 22202
; COMPUTER READABLE FORM:
```


MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.25
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/019,870
FILING DATE: 19930219
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Oblon, No. 5336613man F.
REGISTRATION NUMBER: 24,618
REFERENCE/DOCKET NUMBER: 18-791-0
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 8:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-019-870-8

Query Match 1.6%; Score 101.5; DB 1; Length 774;
Best Local Similarity 21.9%; Pred. No. 1.4;
Matches 91; Conservative 41; Mismatches 139; Indels 145; Gaps 19;

QY 372 VAGVIGAMVSPNSA-----LYLVEDESGMTE-----AK 401
DB 288 VPGVPGPFHAGNGKVAISVTHAFMDIHDLYLEQFAGEGRTARFGNDFEPVANSRDRIAV 347
QY 402 DGGPGPSFNRFYQFAGPHLAANPOTDRDGHVLSQSSTGSSNTEFSDVYALICGFGAPLL 461
DB 348 RGGADREFDIVETRHGPIVAGDP---RDGAALTLSVQFAETDLSFDCLTRMP--GASTV 402
QY 462 ARLLFYLERCDAGFTG--GH-----GDALKYVTGTFDSEIPCSLCEKHTRPVCAHTTVHR 515
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QY 516 LR-----QRMPPFGQATROPIGVFGTMNSOY-----SDCDPLGNVAPY----- 553
DB 457 WRGWIPHEAMPR---VIDPPGGIIVTANNRVVADDDHDPYLCCTDCHP-----PYRAERIMK 508
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DB 509 RLVPANPAFVDDAAAIHADTLSP-----HVGLLRRRLREALGARDSDAAGLQMLVAVWG 563
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DB 624 DDAGMLKGSWDQALSEALSASQNLGTSWGEHRRPFRTHPLATQFPWAGLLNP 679

RESULT 35
US-08-019-870-11
Sequence 11, Application US/08019870
Patent No. 5336613
GENERAL INFORMATION:
APPLICANT: NIWA, MINEO
APPLICANT: YOSHIMASA, SAITO
APPLICANT: SASAKI, HITOSHI
APPLICANT: ISHII, YOSHINORI
TITLE OF INVENTION: A NEW CEPHALOSPORIN C ACYLASE
NUMBER OF SEQUENCES: 42
CORRESPONDENCE ADDRESS:
ADDRESSEE: OBLON, SPIVAK, MCLELLAND, MAIER & NEUSTADT,
ADDRESSEE: P.C.
STREET: 1755 S. Jefferson Davis Highway, Suite 400
CITY: Arlington

STATE: Virginia
COUNTRY: U.S.A.
ZIP: 22202
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.25
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/019,870
FILING DATE: 19930219
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Oblon, No. 5336613man F.
REGISTRATION NUMBER: 24,618
REFERENCE/DOCKET NUMBER: 18-791-0
TELEPHONE: (703) 413-3000
TELEFAX: (703) 413-2220
TELEX: 248855 OPAT UR
INFORMATION FOR SEQ ID NO: 11:
SEQUENCE CHARACTERISTICS:
LENGTH: 774 amino acids
TYPE: amino acid
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-019-870-11

Query Match 1.6%; Score 101.5; DB 1; Length 774;
Best Local Similarity 21.9%; Pred. No. 1.4;
Matches 91; Conservative 41; Mismatches 139; Indels 145; Gaps 19;

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QY 516 LR-----QRMPPFGQATROPIGVFGTMNSOY-----SDCDPLGNVAPY----- 553
DB 457 WRGWIPHEAMPR---VIDPPGGIIVTANNRVVADDDHDPYLCCTDCHP-----PYRAERIMK 508
QY 554 LILRKPGDQTEAAKATMDQTYRATLERFLIDLEQERLLDRGA--PCSSSEGLSSVIV----- 607
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QY 608 -----DHPTFRRLDITL---RARIETTTQ-----FMKVLVET 637
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QY 638 RYKIREG-----LSEA-----THSMALTFDPYSGAFCP 666
DB 624 DDAGMLKGSWDQALSEALSASQNLGTSWGEHRRPFRTHPLATQFPWAGLLNP 679

Search completed: June 3, 2004, 07:15:17
Job time : 34 secs

GenCore version 5.1.6
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OM protein - protein search, using sw model

Run on: June 3, 2004, 07:04:28 ; Search time 553 Seconds
(without alignments)
612.026 Million cell updates/sec

Title: US-09-769-699-2
Perfect score: 6294
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Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 1155919 seqs, 28138677 residues

Total number of hits satisfying chosen parameters: 1155919

Minimum DB seq length: 0
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 100 summaries

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Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

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2	3054	48.5	1452	US-10-050-673-2	Sequence 2, Appli
3	3015.5	47.9	1196	US-10-200-562-200	Sequence 200, App
4	3015.5	47.9	1196	US-10-237-551-200	Sequence 200, App
5	3015.5	47.9	1196	US-10-237-551-232	Sequence 232, App
6	788	12.5	274	US-10-237-551-231	Sequence 231, App
7	736	11.7	248	US-10-237-551-230	Sequence 230, App
8	123.5	2.0	850	US-10-156-761-9121	Sequence 9121, Ap
9	123.5	2.0	2597	US-10-454-351-34	Sequence 34, Appli
10	123	2.0	1074	US-10-206-576-358	Sequence 358, App
11	123	2.0	1074	US-10-206-576-394	Sequence 394, App
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26	120.5	1.9	2597	12	US-09-802-318-10	Sequence 10, Appli
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28	120	1.9	5245	14	US-10-329-079-11	Sequence 11, Appli
29	118	1.9	452	12	US-10-425-114-71520	Sequence 71520, A
30	118	1.9	19608	15	US-10-084-846A-8	Sequence 8, Appli
31	114.5	1.8	1479	12	US-10-231-956A-325	Sequence 325, App
32	114.5	1.8	1496	12	US-10-211-462-87	Sequence 87, Appli
33	114.5	1.8	1496	14	US-10-021-660-125	Sequence 125, App
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35	114.5	1.8	1498	12	US-10-276-774-1957	Sequence 1957, Ap
36	114.5	1.8	1498	12	US-10-243-552-899	Sequence 899, App
37	113.5	1.8	1477	14	US-10-274-583-20	Sequence 20, Appli
38	113	1.8	1682	12	US-10-282-122A-64702	Sequence 64702, A
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43	112	1.8	6620	15	US-10-080-334-290	Sequence 290, App
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59	108	1.7	499	15	US-10-369-493-10577	Sequence 10577, A
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61	107.5	1.7	8026	14	US-10-132-134-12	Sequence 12, Appli
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69	106.5	1.7	3298	15	US-10-120-801-51	Sequence 51, Appli
70	105.5	1.7	707	14	US-10-156-761-9979	Sequence 9979, Ap
71	105.5	1.7	1062	16	US-10-389-566-608	Sequence 608, App
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79	104.5	1.7	3530	12	US-10-296-115-1101	Sequence 1101, Ap
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84	103.5	1.6	1750	12	US-10-243-552-920	Sequence 920, App
85	103	1.6	1050	12	US-10-282-122A-78119	Sequence 78119, A
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ALIGNMENTS

RESULT 1
US-09-769-699-2
; Sequence 2, Application US/09769699
; Publication No. US20010039051A1
; GENERAL INFORMATION:
; APPLICANT: Silverstein, Saul J
; APPLICANT: Lungu, Octavian
; APPLICANT: Gershon, Anne A
; APPLICANT: Annunzio, Paula W
; TITLE OF INVENTION: VZV ORP29p Protein-Related Compositions and Methods
; FILE REFERENCE: 0575/61152-A
; CURRENT APPLICATION NUMBER: US/09769,699
; CURRENT FILING DATE: 2002-04-22
; NUMBER OF SEQ ID NOS: 2
; SOFTWARE: Patentin version 3.1
; SEQ ID NO 2
; LENGTH: 1203
; TYPE: PRT
; ORGANISM: Varicella zoster
; US-09-769-699-2

Query Match      100.0%; Score 6294; DB 12; Length 1203;
Best Local Similarity 100.0%; Pred. No. 0;
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RESULT 2
US-10-050-673-2
; Sequence 2, Application US/10050673
; Publication No. US20020151033A1
; GENERAL INFORMATION:
; APPLICANT: David M. Knipe
; APPLICANT: Travis J. Taylor
; APPLICANT: Elizabeth McNamee
; TITLE OF INVENTION: Replication-Competent Virus Expressing A
; TITLE OF INVENTION: Fusion Protein
; FILE REFERENCE: HUS98-05
; CURRENT APPLICATION NUMBER: US/10/050,673
; CURRENT FILING DATE: 2002-01-16
; PRIOR APPLICATION NUMBER: US/09/127,227
; PRIOR FILING DATE: 1998-07-31
; NUMBER OF SEQ ID NOS: 6
; SOFTWARE: FastSeq for Windows Version 3.0
; SEQ ID NO 2
; LENGTH: 1452
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Db 835 SNOQPNQFWTALQNLQPARLLSREDIETIAFKRFSLDYGAINFINLAPNNVSELAMY 894
Qy 893 YMANILKYCDHSOYLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEK 952
Db 895 YMANILKYCDHSOYLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEK 951
Qy 953 TENLPELWTTAFTSTHLVRAANNQRPVNLGISIKYHGAAGNNRVFQAGNWSGLNGKN 1012
Db 952 LDAHPGAWTSMFASCNLLRPVMAARPMVLJLSISKYMGANDRVFQAGNWSGLNGKN 1011
Qy 1013 VCPLEFTRDRRTFRIACPRGGFTCPVTGPSSGNRETTLSQVGRGIIIVSGGAMVQLAIYAT 1072
Db 1012 ACPLLLFDRTRKRVLCAPRAGFVCASSLGGAHESLCEQLAGIIAEGGAIVASSVFA 1071
Qy 1073 VYRAVGARAHMAFDWLSITDDEFIARDLEELHDOIIOLETPTWVEGAL-----BAVKI 1128
Db 1072 TVKSLGPRTOQLQIEDWALLEDEYLSEEMMETTRALERGHGEWSTDAALEVAHEAL 1131
Qy 1129 LDEKTTAGDGETPNTLAFNDSCEPSHDTTNSVLNLSGNSISGTVPGKRPPEDDLEFD 1188
Db 1132 VSQLGAAE-----VFNFGDFGDEDDHAASFGGLAAA--AGAAGVARKRAFGHDDPFG 1182
Qy 1189 LSGIPIKHGNTMEM 1203
Db 1183 -EGPPEKK-DLTLD 1195

RESULT 4
US-10-237-551-200
; Sequence 200, Application US/10237551
; Publication No. US20030165820A1
; GENERAL INFORMATION:
; APPLICANT: Day, Craig H.
; APPLICANT: Hosken, Nancy A.
; APPLICANT: Parsons, Joseph M.
; TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR THE DIAGNOSIS AND
; TITLE OF INVENTION: TREATMENT OF HERPES SIMPLEX VIRUS INFECTION
; FILE REFERENCE: 210121.538C3
; CURRENT APPLICATION NUMBER: US/10/237.551
; CURRENT FILING DATE: 2002-09-06
; NUMBER OF SEQ ID NOS: 254
; SOFTWARE: FastSeq for Windows Version 4.0
; SEQ ID NO 200
; LENGTH: 1196

; TYPE: PRT
; ORGANISM: HSV2
US-10-237-551-200
Query Match 47.9%; Score 3015.5; DB 14; Length 1196;
Best Local Similarity 49.0%; Pred. No. 2.5e-230;
Matches 595; Conservative 213; Mismatches 366; Indels 41; Gaps 16;
Qy 4 TQKTVVPTGPGVYV--ACRVEDLDLEEISFLAARSTDSDLALLPLMRNLTVVEKTTSS 61
Db 7 TTTTVKVPFGMGVYGRACPAEGLEL--LSLSARSGDADVAAPLIVGLTVESGFEAN 64
Qy 62 LAVVSGARTTLAGAGITLKLTTSHFYPSVFVPHGGKHLVLPSSAAPNLTRACNAARBF 121
Db 65 VAAVVGSTTGLGCTAVSLKMLPSSHYSVSVVFFHGRHLAPSTQAPNLTLRACERAPFG 124
Qy 122 PSRCQGPVDAVETTGABICTRLGLEPENTILYLVLTALFKEAVFMCNVLHVGGLDIV 181
Db 125 FADYAPRPCDKHETTGDCALCERLGLDPRALLLVITTEGFREAVCISNTFLHGGMDKV 184
Qy 182 HINHGDIIRIFLPVQVLFMPDVNRLVPDPFNTHRSIGEGFVYPTPTFYNTGOLCHLIHDCV 241
Db 185 TIGDAEVHRIIVYPLQFMFDPFSVIADPNCNHRSIGENFNYPFLPFNRFLARLLFEAV 244
Qy 242 IAPMAVALRVNVTAVARGAAHLAFDENHGAUPLPDIITYTYFSSSGTITAGARRND 301
Db 245 VGPAVALRARNVDVARAAAHAFDENHGAALPADITFTAFASQO--KPQGAR--- 299
Qy 302 VNSTKSPSGGFERRLASIMAAADTALHAEVINTGIEETPTDIKEWPMFIGNEGTLPR 361
Db 300 --DAGKGPAGGFORLASVWAGDAALALLESIVMAVDEPPDDITTWLLEGGQETPAAR 357
Qy 362 LNALGYSYTRAVAGVIGAMVFPNSALYLTVEVDSGMTAKDGGPGSPFNRRYQFAGHLA 421
Db 368 AGAVGAYLARAAGLVGAMVFPSTNSALHLTEVDDAGPADPKDHSK-PSEYRFFLPVGHVA 416
Qy 422 ANPQDRGCHVL-----SSQSTGSSNTBESVDYLLALICGFGAPLLARLLFYLERCDAG 474
Db 417 ANPQDRGCHVVPVGEGRPTAPLVGGTQ-BFAGEHLAMLCGFSALLAKGLFYLERCDGG 475
Qy 475 AFTGCHG-DALKYVTGTFSEPCSEKCHTPVCAHTTVHRLQRMFRFGQATQPIGV 533
Db 476 VIVGRQEMDVFRVADSGQTDVPCNLCTETRHACATHTLMRLARHPKPFASAARGAIGV 535
Qy 534 FGTMSQYSDCDPLGNVAPYLIILKRGDQTEAAKATMDQTYRATLERLIDLEQERLLDR 593
Db 536 FGTMSAYSDCDVLGNVAFSAALKR-ADGSENTRTIMQETRYAATERVMAEALQYVDQ 594
Qy 594 GAFCSSEGLSSVIVDHPFTRRIIDTLRARIEQTTTQFMKVLVETRDYKIREGLSEATHSM 653
Db 595 AVPTALGRLEITIIGNEALHTVNNIKQVDBEVQOLMENLIEGRNFKFRDLAEANHAM 654
Qy 654 ALTFDPYSGAFCPITNFLVKRTHLAVQDLALSOCHCVYGOQVEGRNFRNQFQVLR 713
Db 655 SLSDPYTCGCPCLLQALLARRSNLAVYQDLALSOCHGVFAGQSVGRNFRNQFQVLR 714
Qy 714 FVDLENGGFISTRITVTLSSEG-PVSAFNPTLGDAPAGRTFDGDLARVSVEVIRDIRVK 772
Db 715 VMDLFNNGFLSAKTLTVALSEGAACAPSUTAGTAPAESSEFGDVARVTILGFKELRVK 774
Qy 773 NRVPFSGNCTNLSEAAARLVGLASAYQQRKRVDMHGLGALLKQFGLLFFPRGMPN 832
Db 775 SRVLFAGASANASEAAKARVASLQSAQYKQDPKRVDDILLGLPLGFLKQFHAVIFPNK 834
Qy 833 SKSPNPFOWTLLORNQMPADKLTHEETITIAAVKFTTEYAAINFINLPPTCIGELAO 892
Db 835 SNOQPNQFWTALQNLQPARLLSREDIETIAFKRFSLDYGAINFINLAPNNVSELAMY 894
Qy 893 YMANILKYCDHSOYLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEK 952
Db 895 YMANILKYCDHSOYLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEK 951
Qy 953 TENLPELWTTAFTSTHLVRAANNQRPVNLGISIKYHGAAGNNRVFQAGNWSGLNGKN 1012

Db 952 LDAHPGAWTSMFASCNLLRPVMAARPMVVLGLSISKYGMAGNDRVFOAGNWSALLGGKN 1011
Qy 1013 VCPLEFTRERELIACPRGFFCPVTGSSGNRETTLSDOVRGIIIVSGAMVQLAIYAT 1072
Db 1012 ACPELLIFDRTRKVLACPRAGFVCAASSICGGGAHESLCEQLSGIIABGGAASVSFVA 1071
Qy 1073 VVRAGARQAQMAFDDWLSITDDEFLARDUEELHDDQIIOTLETPWTEGAL----EAVKI 1128
Db 1072 TVKSLGPRTOQLQIEDWALLEDEYLSSEMMETTRALERHGHGEMSTDAALEVAHEAAL 1131
Qy 1129 LDEKTTAGDEPTNLAFNDSCEPSHDTTSNVLNIGSNISGTVPGIKRPPDELF 1188
Db 1132 VSOLGAAGE-----VFNFGDFGDEDDHAASFGGLAAA--AGAAGVARKRAFPHGDDPFG 1182
Qy 1189 LSGIPKHNITMEM 1203
Db 1183 -EGPPEKK-DLTLDM 1195

RESULT 5
US-10-237-551-232
; Sequence 232, Application US/10237551
; Publication No. US20030165820A1
; GENERAL INFORMATION:
; APPLICANT: Day, Craig H.
; APPLICANT: Hosken, Nancy A.
; APPLICANT: Parsons, Joseph M.
; TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR THE DIAGNOSIS AND
; TITLE OF INVENTION: TREATMENT OF HERPES SIMPLEX VIRUS INFECTION
; FILE REFERENCE: 210121.538C3
; CURRENT FILING DATE: 2002-09-06
; NUMBER OF SEQ ID NOS: 254
; SOFTWARE: FastSeq for Windows Version 4.0
; SEQ ID NO 232
; LENGTH: 1196
; TYPE: PR1
; ORGANISM: Herpes simplex virus
US-10-237-551-232

Query Match 47.9%; Score 3015.5; DB 14; Length 1196;
Best Local Similarity 49.0%; Pred. No. 2.5e-290;
Matches 595; Conservative 213; Mismatches 366; Indels 41; Gaps 16;

Qy 4 TQKTVVTGTLGVY--ACRVEDLDEEISFLAARSTDSDLALLPLMRLNLTVEKFTPS 61
Db 7 TTTTVKVPYVPGMGVYGRACPAEGLEL--LSLLSARSADVAVALIIVGLTVESGFEAN 64
Qy 62 LAVVSGARTTGLAGAGITLKTTSHEVPSVVFHGGKHLVPSAANLTRACNAARERG 121
Db 65 VAAVVGSRITGLGTAVSLKMPSHSPSVYVFGGKHLAPSTQAPNLTLCERARPHFG 124
Qy 122 FSRQGPVVDGAVETTGAEICTRLGLEPENTILYLVVLTALFKEAVPMCNVFLHYGLDIV 181
Db 125 PADYARPCDLKHETTGALCERGLDPRDRLVLYVITEGFREAVCISNTFLHGGMDKV 184
Qy 182 HINHGDIIRLPPVQLFMDVRLVDPDPNTHRSIGEGFVYPTPTNTGLCHLHDCV 241
Db 185 TIGDAEYHRIYVPLQWFMEDFGRVIADPNCNHRSGENFNYPFLPFNRLPLARLLFEAV 244
Qy 242 IAPMAVALRVNTAVARGAAHLAFDENHGAVALPDDITVYFQSSSGSTTARGARRND 301
Db 245 VGPAVALRARNVDNARAHAHLAFDENHGAALPADITTAFAESQG--KPQRGAR--- 299
Qy 302 VNSTKSPGGFERRIASTVAADTALHAEVNTGTYETPTDIXEWNFIOMEGTLPR 361
Db 300 --DAGNKGPAQGPQRLASVMAGDAALSALESIVSMVAFDPPDPDITWPLLEGQETPAAR 357
Qy 362 LNALGSYAVAGVIGAMVSPNSALVLTVEVSGMTEAKDGGGSPENRFYQFAGPHLA 421
Db 358 AGAVGAYLARAAGLVGAMVSTNSALHTEVDGADPADPKDHSK-PSFTRFRLVPGTHVA 416

Qy 422 ANPQDRDRGHVL-----SSQSTGSSNTEFSVDYLALICGFGAPLLARLLFYLERCDAG 474
Db 417 ANPQDRDRGHVVPVGEGRPTAPLVGGTQ-EPAGEHLAMLGFSALLAKMLFYLERCDGG 475
Qy 475 APTGHHG-DALKYVTGTFDSSEIPCSLCEKHTRPVCAHTVHRLRORMPRFOATQPTGV 533
Db 476 VIVGQEMDVFRYVADSCQTDPVNCNLTCTFTRHACAHITLMRLRARHPKPKFASAAAGALGV 535
Qy 534 FGTMMNSQSDCDPLGNVAPYLILIRKPGQDTEAAKATMODTYRATLERLFIIDLEQERLLDR 593
Db 536 FGTMMNSAISDCDVLGNVAAFSAKX-ADGSENTRIMQETRYAATERVMAEALQYVDQ 594
Qy 594 GAPSCEGLSSVIVDHPTRFRILDTLRARIEQTTTQFMKVLVETRDYKIRGLSEATHSM 653
Db 595 AVFTALGRLTIIIGNREALHTVWNKIQLVREVEQLMRNTEGRNFKFRDGLAEANAM 654
Qy 654 ALTEDPYSGAFCEITNELVXKTHLAVVODLALSOCHCVFYGOVEGRNFRNQFQVLRER 713
Db 655 SLSLDPYTCGCPFLLOLLARRNLAVYODLALSOCHGVFAGQSVGEGRNFRNQFQVLRER 714
Qy 714 FVDLPNGGFISTRITVTLSSEG-PVSAENPTLGDAPAGRTFDGLARVSVEVIRDIRVK 772
Db 715 VMDLFNNGFLSAKTUTLVALSEGNAICAPSLTAGOTAPAESFEGDVARVTLGFPKELRVK 774
Qy 773 NRWFSNCTNLSEARARLVGLASAYQORQKRVDMHLGALGFLLKQFHLGLLPPEGMPPN 832
Db 775 SRVLFAGASANASEAAKARVASLOSAYQKPKRVDDILILGFLGFLKQFHAVIPPNKXPPG 834
Qy 833 SKSPNPQFWTLLQRNOMPADKLTHEEITTTAAVKRFTTEYAAAIFINFLPPTCIGELAQF 892
Db 835 SNQNPQFWTALQRNQLPARLSREDIETIAFKRFSLDYGAINFINLAPNVVSELAMY 894
Qy 893 YVANILKYCHSQYLINTLSITITGARRPDPSSVLHWIKVDVTSADTETQAKALLEK 952
Db 895 YMANQILRYCDHSTYFINTLTAVIAGSRPPSVQAAAAWAFQ---GGAGLEAGAEALMDS 951
Qy 953 TENPELMTTATSTHLYRAAMNORPMVVLGISIKYHGAAGNRRVFOAGNWSGLNCGKN 1012
Db 952 LDAHPGAWTSMFASCNLLRPVMAARPMVVLGLSISKYGMAGNDRVFOAGNWSALLGGKN 1011
Qy 1013 VCPLEFTRERELIACPRGFFCPVTGSSGNRETTLSDOVRGIIIVSGAMVQLAIYAT 1072
Db 1012 ACPELLIFDRTRKVLACPRAGFVCAASSICGGGAHESLCEQLSGIIABGGAASVSFVA 1071
Qy 1073 VVRAGARQAQMAFDDWLSITDDEFLARDUEELHDDQIIOTLETPWTEGAL----EAVKI 1128
Db 1072 TVKSLGPRTOQLQIEDWALLEDEYLSSEMMETTRALERHGHGEMSTDAALEVAHEAAL 1131
Qy 1129 LDEKTTAGDEPTNLAFNDSCEPSHDTTSNVLNIGSNISGTVPGIKRPPDELF 1188
Db 1132 VSOLGAAGE-----VFNFGDFGDEDDHAASFGGLAAA--AGAAGVARKRAFPHGDDPFG 1182
Qy 1189 LSGIPKHNITMEM 1203
Db 1183 -EGPPEKK-DLTLDM 1195

RESULT 6
US-10-237-551-231
; Sequence 231, Application US/10237551
; Publication No. US20030165820A1
; GENERAL INFORMATION:
; APPLICANT: Day, Craig H.
; APPLICANT: Hosken, Nancy A.
; APPLICANT: Parsons, Joseph M.
; TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR THE DIAGNOSIS AND
; TITLE OF INVENTION: TREATMENT OF HERPES SIMPLEX VIRUS INFECTION
; FILE REFERENCE: 210121.538C3
; CURRENT FILING DATE: 2002-09-06
; NUMBER OF SEQ ID NOS: 254
; SOFTWARE: FastSeq for Windows Version 4.0
; SEQ ID NO 231

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; LENGTH: 274
; TYPE: PRT
; ORGANISM: Herpes simplex virus
US-10-237-551-231

Query Match 12.5%; Score 788; DB 14; Length 274;
Best Local Similarity 56.5%; Pred. No. 3.1e-69;
Matches 153; Conservative 41; Mismatches 75; Indels 2; Gaps 1;

QY 28 LEETSFLAARSTDSLLPLMRNLVTEKTTSSSLAVSGARTTGLAGAGITLKLTTSHF 87
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
2 LELLSLSARSGDADVAFLVGLTVESGFSEANVAAVGSRSTTGLGGSFVSLKLMPSHY 61
QY 88 YPSVVFHCGKHVLPSSAANLTSACNAARERGFSCRQGPVVDGAVETTGAEICTRLGL 147
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
62 SPVSVVFGGRLAPSTCAQNLFLCEARRHGFSDYAPRCDLKHETTGDALCERLGL 121
QY 148 EPENTILYLVTTALFKRQAVNCNVFLHYGGLDIVHINHGQVIRIPLFPVLQFMPDVNRILV 207
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
122 DADRALLYIVITEGFEAVCISNTFLHGGMDKVTIGDAEVHRIPVYPIQMFMPDFSRI 181
QY 208 DDPNTHRSIGEGVPTPPYNTGLCHLTHDCVIAPMAVALRVNRVTAVARGAAHLAFD 267
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
182 ADPFNCNHRISGENFNYPPLPFNFRFLARLLFEAVGPAVALRNVDAVARAAHLAFD 241
QY 268 ENHEGALVPDDITYTYFQSSSGTTARGAR 298
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
242 ENHEGALPADITTTAPEASQG--KPKRGAR 270

RESULT 7
US-10-237-551-230
; Sequence 230, Application US/10237551
; Publication NO. US20030165920A1
; GENERAL INFORMATION:
; APPLICANT: Day, Craig H.
; APPLICANT: Hosken, Nancy A.
; APPLICANT: Parsons, Joseph M.
; TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR THE DIAGNOSIS AND
; TITLE OF INVENTION: TREATMENT OF HERPES SIMPLEX VIRUS INFECTION
; FILE REFERENCE: 210121.538C3
; CURRENT APPLICATION NUMBER: US/10/237,551
; CURRENT FILING DATE: 2002-09-06
; NUMBER OF SEQ ID NOS: 254
; SOFTWARE: FastSeq for Windows Version 4.0
; SEQ ID NO 230
; LENGTH: 248
; TYPE: PRT
; ORGANISM: Herpes simplex virus
US-10-237-551-230

Query Match 11.7%; Score 736; DB 14; Length 248;
Best Local Similarity 57.7%; Pred. No. 4e-64;
Matches 139; Conservative 36; Mismatches 66; Indels 0; Gaps 0;

QY 47 PLMRNLVTEKTTSSSLAVSGARTTGLAGAGITLKLTTSHFSPVVFHCGKHVLPSSAA 106
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
3 PLTVGLTVESGFSEANVAAVGSRSTTGLGGSFVSLKLMPSHYSPVVFHCGRHLAPSTQA 62
QY 107 ENLTSACNAARERGFSCRQGPVVDGAVETTGAEICTRLGLEPENTILYLVTTALFKEAV 166
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
63 PNLTLCERARRHGFSDYAPRCDLKHETTGDALCERLGLDADRALLYIVITEGFEAV 122
QY 167 FMCNVFLHYGGLDIVHINHGQVIRIPLFPVLQFMPDVNRILVDPDPFNTHRSIGEGFYPT 226
Db : : : : : : : : : : : : : : : : : : : : : : : : : : : : : :
123 CISNTFLHGGMDKVTIGDAEVHRIPVYPIQMFMPDFSRIADPPFNCNHRISGENFNYP 182
QY 227 PFNTGLCHLTHDCVIAPMAVALRVNRVTAVARGAAHLAFDENHEGAVLPDDITYTYFOS 286
Db 183 PFNFRFLARLLFEAVGPAVALRNVDAVARAAHLAFDENHEGALPADITTTAPEA 242
QY 287 S 287

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Db 243 S 243

RESULT 8
US-10-156-761-9121
; Sequence 9121, Application US/10156761
; Publication No. US20030119018A1
; GENERAL INFORMATION:
; APPLICANT: OMURA, SATOSHI
; APPLICANT: IKEDA, HARUO
; APPLICANT: ISHIKAWA, JUN
; APPLICANT: HORIKAWA, HIROSHI
; APPLICANT: SHIBA, TADAYOSHI
; APPLICANT: SAKAKI, YOSHIYUKI
; APPLICANT: HAITTORI, MASAHIRA
; TITLE OF INVENTION: NOVEL POLYNUCLEOTIDES
; FILE REFERENCE: 249-262
; CURRENT APPLICATION NUMBER: US/10/156,761
; PRIORITY FILING DATE: 2002-05-29
; PRIOR APPLICATION NUMBER: JP 2001-204089
; PRIOR FILING DATE: 2001-05-30
; PRIOR APPLICATION NUMBER: JP 2001-272697
; PRIOR FILING DATE: 2001-08-02
; NUMBER OF SEQ ID NOS: 15109
; SEQ ID NO 9121
; LENGTH: 850
; TYPE: PRT
; ORGANISM: Streptomyces avermitilis
; US-10-156-761-9121

Query Match 2.0%; Score 123.5; DB 14; Length 850;
Best Local Similarity 20.5%; Pred. No. 0.046;
Matches 182; Conservative 104; Mismatches 327; Indels 273; Gaps 37;

QY	Db	305	TSKPSPSGGGE	-----RRLASMAADTALHAEVIFNTGTYEETPTDIKEWPMFIGM	355
QY	Db	3	TSRTPESAGAEPPSPVRRAHAGPADE	54	
QY	Db	356	EGTLPR	399	
Db	Db	55	WGRPRTRVRAKIYCLLMVPVSLALWAY	105	
QY	Db	400	AKDGGPGPSNNRYQFAGPHLANPQDTRDGHVLSQSTGSSNTEFSVDYIAL	455	
Db	Db	106	RAPVAAVAALQAEAAAARHVDPESAEPD	161	
QY	Db	456	FGAPLLARLLFYLERCDAGFTGGHGDAKXVVTGTFDSEIPCSLCEKHTRPVCATHTVHR	515	
Db	Db	162	DGADLPACQVPGRLTFTVSGA	194	
QY	Db	516	LRQMPFPGQATROPIGVFGTMN	573	
Db	Db	195	RARWDETFQYTRTIAAFVGGALTGQDAD-LGSDARVLL	631	
QY	Db	574	YRATLERLFIDLEOERL-LRGAPCSSEGLS-SVIVDHPFRRLDITLRLARLEQTTCQFM	720	
Db	Db	249	AVLSSARLAGTLDDGERLRLFTGAVDTRTLDTSAVAD	302	
QY	Db	632	KVLVETRDYKI	669	
Db	Db	303	YADVTRAEKVLNRPGARRIAAPQATWDPAHARVQEGMETIEADAGRGVADRADPLTR	362	
QY	Db	670	FLVXRTHLAVQDIALSCCHCVF	720	
Db	Db	363	GLLTPGAAVLFGLAAVAASLVISVRICRGIVIELISLNSALEIARLKLPCAMEKLRAG	422	
QY	Db	721	GFISTRTSYTLSSGPVSAP-NPTLGQDAPAGRTFDGDLARVSVEVIRDIRVGNRVVPSG	779	
Db	Db	423	EEIDVR	461	
QY	Db	780	NCTNLSEARARLVGLASAYQQRKRVMDMLHGALGFLLLKQFHGLLFPFGMPNPSKSPNQ	839	
Db	Db	462		472	

QY 840 WFTLLORNOPADKLTHERITIAAVKRTTEBYAAINFINLPTTCIGELAQFYMANLIL 899
Db 473 -FVNLAERSQI-----LVHRQLSLDSMERSESD-----PNLSOL--FRLDHLTT 515
QY 900 KYCDHSOYLNTLTSIITGA---RRPRDPSSVLHWIRKDVTSAAD---IETQ----- 945
Db 516 RMRRHASLSI-----ILSGAAGPGEATMPVSLTNVVEAAVEVEDYARVEVROLPEASVV 570
QY 946 AKALLEKTENLPELWTTA---FTSTHLVRAAMNORP-----MVLGISISIKYHGAAGN 995
Db 571 GAAVADLTHLMAETVENAAQSPPH--TRVRVTGEPVGVNGYAVEVEDRGLGMGKETLAEAN 629
QY 996 NRVPQAGWSGLNGKVCLEFTEFDRTRFIIA-----CPRGGFICPVTGP 1041
Db 630 RRIEQS-----BALDLFSDRLGLFVSVLRAARHGKIKVHLRTSPYGGTTAVVLLP 679
QY 1042 S-----SGNRETT--LSPQVRGIIYSGGAMVOLAIYATVVRAGARA 1081
Db 680 TALLHSGTAERVPRAAADTGRD--ASPAYARVAAASHQSVQQAQGRPA 724
RESULT 9
US-10-454-351-34
; Sequence 34, Application US/10454351
; Publication No. US20040053301A1
; GENERAL INFORMATION:
; APPLICANT: Quark Biotech Inc.; Paz Einat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; FILE REFERENCE: 010/PCT2-US2; EINAT=7E
; CURRENT APPLICATION NUMBER: US/10/454,351
; CURRENT FILING DATE: 2003-06-04
; PRIOR APPLICATION NUMBER: US 09/991,630
; PRIOR FILING DATE: 2001-11-06
; PRIOR APPLICATION NUMBER: US 09/905,129
; PRIOR FILING DATE: 2001-07-13
; PRIOR APPLICATION NUMBER: US 09/802,318
; PRIOR FILING DATE: 2001-03-08
; PRIOR APPLICATION NUMBER: US 09/729,485
; PRIOR FILING DATE: 2000-12-04
; PRIOR APPLICATION NUMBER: US 09/312,216
; PRIOR FILING DATE: 1999-05-14
; NUMBER OF SEQ ID NOS: 37
; SOFTWARE: PatentIn version 3.0
; SEQ ID NO 34
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus rattus
US-10-454-351-34
Query Match 2.0%; Score 123.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.33;
Matches 145; Conservative 114; Mismatches 286; Indels 233; Gaps 40;
QY 416 AGPHLAANPQTD--RDGHVLSQSQTSGSN-----TEFSVDYALICG 455
Db 274 SCAGFLCTPTIDPSLSKSLVTOEDNGASTSPQDFIEPFGSLNMTDLSGNKADWVCS 333
QY 456 FGAPILARLLFYLERCDAGFTGGHGDALKVYTGTFDSEIPCSLCEKHTRPV---CAHT 511
Db 334 IQKP-----SRTSPTAFTENDYM--LNASFSTNLVCSVDYNIHQPWQLLALYS 382
QY 512 TVHRLRQRM-----RFGQATROPIGVFGTMSQYSCDPLGNVAPYLILRKPGD 561
Db 383 DSPILLERPOLTEPFLSSRYKQVALRPEDIFTSIEADVR--ADPFWFQEKIVLQLNRT 441
QY 562 QTEAAKATWQTYRATLERLFDLQERL-----LDR-----GAPCSSEG 601
Db 442 ATTLSLQIQFSTQAOIALPRAEMRAERLKWMLAMNNPKLERVLVGGTIALSCPGK 501
QY 602 -----LSSVIVDHPTR-----RIIDLTLRAIE-QTTQFMKVL---VETRD----- 639

Db 502 DPSPHLEWLLADGSKVRAPYVSEDRILIDKNGKLEQLQADSFDAGLYHCISTNDADAV 561
QY 640 --YKIR--EGISEATHSWALTFDPYSGAF-----CPITNFKRTHLAVVQDLALSOCHCV 691
Db 562 LTYRITVVEPYGESHTDSGVQHTVVGTETLDPCLSTG-----VPDASIS--WI 608
QY 692 FYGQOVEGRNFANQPQVLRFRFVDFLNGGFISTRSITVTLSEGPVS--ANPT----- 743
Db 609 LFGNTVFSQPSRDR-----QILNNGTLRIQLQVT--PKDQGHYQCVAAANPSGADFSS 657
QY 744 -----LGODAPAGRTFDCGLARVSVEVIRDIRVKNRVVFSNGCNTLSLSEAAAR 791
Db 658 FKVSQVKQKQVRVHEDREAGSGGLGE--PNSSVSLKQPSALK--LSASALTGSAGKQ- 711
QY 792 LVGLASAVQOERKRYDMLHGLG--FLKQFHGLLFPFGMPNPNKSPNQWFWTLLO---R 847
Db 712 ----VSGVHRKKNKRDLIHRRRGDSTLRRFE--HRRQLPLSARRIDPQWMAALLEKAKK 765
QY 848 NOMPADKLTHERITT-----IAVKRTEBYAAINFINLPTTCIGELAQFYMANLIL 900
Db 766 NSVP-----KKQENTTVKVPVLAIVLVELTDEEKDASGMI--PP----- 802
QY 901 YCDHSOYLNTLTSIITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEKTENLPELW 960
Db 803 --DEEFMWLKTAKSGVFGSRPTADSGPVNHGFWTSIAGTEVSTVYNPOTLQ--SEHLPDFK 859
QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISIKYHGAAGNNEVFOAGNWSG-- 1006
Db 860 LFSVINGTAVTKSMNPSTASKIEDTNNQPIIIFP--SVAEIRDSA-----QAGRASSQS 912
QY 1007 ----LNGGKNVCPLFIFDRTRRRIIACPRGGFI-----CpVTG---PSSGN 1045
Db 913 AHPVTGNN-----MATYGHNTYSSFTSKASTVQIOPINPTESYGPQIPITGVSRPSSD 966
RESULT 10
US-10-206-576-358
; Sequence 358, Application US/10206576
; Publication No. US20030017495A1
; GENERAL INFORMATION:
; APPLICANT: Choi et al.
; TITLE OF INVENTION: Enterococcus faecalis Polynucleotides and Polypeptides
; NUMBER OF SEQUENCES: 497
; CORRESPONDENCE ADDRESS:
; ADDRESSER: Human Genome Sciences, Inc.
; STREET: 9410 Key West Avenue
; CITY: Rockville
; STATE: Maryland
; COUNTRY: USA
; ZIP: 20850
; COMPUTER READABLE FORM:
; MEDIUM TYPE: CD-R
; COMPUTER: Dell Latitude
; OPERATING SYSTEM: Windows 98
; SOFTWARE: ASCII Text
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/10/206,576
; FILING DATE: 29-Jul-2002
; CLASSIFICATION: <Unknown>
; PRIOR APPLICATION DATA:
; APPLICATION NUMBER: US 09/071,035
; FILING DATE: 1998-05-04
; APPLICATION NUMBER: US 60/046,655
; FILING DATE: 1997-05-16
; APPLICATION NUMBER: US 60/044,031
; FILING DATE: 1997-05-06
; APPLICATION NUMBER: US 60/066,009
; FILING DATE: 1997-11-14
; ATTORNEY/AGENT INFORMATION:
; NAME: Hyman, Mark J
; REGISTRATION NUMBER: 46,789
; REFERENCE/DOCKET NUMBER: PB369P1DI
; INFORMATION FOR SEQ ID NO: 358:


```
;
; SEQUENCE CHARACTERISTICS:
; LENGTH: 1074 amino acids
; TYPE: amino acid
; STRANDEDNESS: single
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; SEQUENCE DESCRIPTION: SEQ ID NO: 358:
US-10-206-576-358

Query Match
  2.0%; Score 123; DB 12; Length 1074;
Best Local Similarity 18.3%; Pred. No. 0.078;
Matches 206; Conservative 150; Mismatches 415; Indels 352; Gaps 52;

QY 250 RVRNVTAVARGAAHLAFDENHEGAVLPDPITYTFQSSSGTTTARGARRNDVNSTSKPS 309
DB 67 RTTSLYAEVNGAKQVFC-IEPGVSIPTVTHGY-----QKNPL 104

QY 310 PSGGFERRIASIM--AATLHAEVINTGTIYEE-----TPTDIKWPMPFI 353
DB 105 PMSDRKAKLVSVLWEXAGTDIDTNVAKQMIWEVNGYKLSIKRGGASVDIK-----158

QY 354 GMEGTLPRNLGASYTAR-----VAGVIG-AMVSPNSALYLTVEVDSGTEAKDGCP 405
DB 159 SIEGKINK--AIEYQKQSFHNTVKTILGQSTTLIDKNELNLSFQVQNTA-----211

QY 406 GPSFNRFYQAGPHLAANPOTDRDGHVLSQSSTGSSNTSFSDYALICGFGAPLIARLL 465
DB 212 ----NIDYRVIGNQLVLP-----NENSKSGTLTLKKSAGTGT-PVAYKK 251

QY 466 FYLERCDAGFTGGHGDALKYVTGTFDSEIPCLCEKHTRPVCAHTVHRLQRPRFCQ 525
DB 252 AGLQTVMAGALDRPNTYAIKINVTETKGS-LKIKKIDKESGDIVPTVFHL-----DFCK 304

QY 526 A-----TRQPIGVFGTMSQYSDCPLGNYA-----PYLILRKPGDOTEAAKATM 570
DB 305 ALPSKDVTTDKGI-----SILDGIPHGKTKVITEKSVDPDKMIDTTPWATIKAGETI 358

QY 571 QDTRATLERLFDLEOERLLDRGAPCSSEGLS-----SVIVDHPT---FRILDTLRA 621
DB 359 SMTSKMRQKGQILLEKTG-VETGDTLWNDNYSLAGNTFAIRKDSPAGEIVQBITTDEKG 417

QY 622 RIQCTTTPMKVLVEIRDYKIRGLSEATHSMALTFDP-----YSGAFCPITNFLVKET 675
DB 418 RAE--TPKELANALELGTYYTVE--TKSSNGFVNTFPKTKVELKIANQTVALTVSNNKQ 473

QY 676 HLAVVDLAL-----SOCHCVFYGQOV-----EGNFRNQFPVLRFRFVDL 717
DB 474 NQBITGTTITKEDKDTGNESQKAEFKGAEYTLFTAKDQQAQVWSEAFK-----TEL 526

QY 718 FNGGFSTRSITVTLSB-GPVSAFNPTLQO-----DAPAGTFDGLARVSVE-----764
DB 527 VKGTRKASDETTLALDEKNQVAVKHLAINEYFQWETKAPEGYTLDKTYFVSIKKVDNNE 586

QY 765 ----VIRDIRVKNRV-----FSGNCTNLSEAA-----RARLVGLASAYQQRKR 805
DB 587 KNAVIRDTVTAQGVIRFGDFEFKAGSADGTAETGNDLSFKVSPLEGTXEITGAEDKA 646

QY 806 VDMHLGALGF-----LKKQFHGLLPFRGM-----PPNSKS-----PNP 838
DB 647 TTACNEQLGFDGYGKFENLPYGYLLIEIEA-----PEGFQKITLEIRSTFKENKDDYAKS 703

QY 839 QWFTLLORNQ-----MPADKLTHEITIAAVKRFTEEYAAINFNLNLP--PTCIGE 888
DB 704 EYVFTITEGQKQPIKAVTVPEKLTNNE-----FSVLNRLMLDYLPEKEDSLTS 754

QY 889 LAQFYMANLILKYCDHSQYILNTLTSITGARRPRDPSSVLHWIRKD-----VTSAAIDETQ 945
DB 755 LATWKDGNKKLNTLDFTF-LVDKIL-----RYNLHEIKEDWYVVAQIDVEA- 799

QY 946 AKALLEKTNLPELWTAFTST-----HLVRAAMQRPMPVILGISISYHGA 992
DB 800 TKAAQEKDEKAKPVVIAETATLANKEKGTWKILHKLTAEQ-----VLDRKSVILFNIV 853
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QY 993 AGNNRVFOAGNWSGLNGKNCVCLPFTFDRTRRFIIACPRGGFICPVTGPSSGNRETTLS 1052
DB 854 YENKVAFEAGNE-----PVA-----KASLNN 875

QY 1053 QVRGIIVSGGAMVOLAIYATVAVARGAR-----AQMADFDDWLSLTDDEFLARDL-- 1102
DB 876 QAQ-----TVNCTIERHVSITQKAHLEDGSGTFTGDMVDMDFDVSVTHDVL 923

QY 1103 --BELHDOIOTLETPTWTVGSAEAVKILDR-----KTVAGD-----GETPTNLAFNFD 1149
DB 924 GSKAFETILYALLPDGTNKEINWKGKIEHVNDKEFTKTVLAEKVDTGKYPGCTKETF- 982

QY 1150 SCEPSHDTTSNV-----LNISGNSISGSTVPGDKRPPEDDE 1185
DB 983 -TEINYEKDGNVNGKHNEKDLKESQTLTPKEVPTIPSTPKQPE 1024

RESULT 11
US-10-206-576-394
; Sequence 394, Application US/10206576
; Publication No. US20030017495A1
; GENERAL INFORMATION:
; APPLICANT: Choi et al.
; TITLE OF INVENTION: Enterococcus faecalis Polynucleotides and Polypeptides
; NUMBER OF SEQUENCES: 497
; CORRESPONDENCE ADDRESS:
; ADDRESSEE: Human Genome Sciences, Inc.
; STREET: 9410 Key West Avenue
; CITY: Rockville
; STATE: Maryland
; COUNTRY: USA
; ZIP: 20850
; COMPUTER READABLE FORM:
; MEDIUM TYPE: CD-R
; COMPUTER: Dell Latitude
; OPERATING SYSTEM: Windows 98
; SOFTWARE: ASCII Text
; CURRENT APPLICATION DATA:
; APPLICATION NUMBER: US/10/206,576
; FILING DATE: 29-Jul-2002
; CLASSIFICATION: <Unknown>
; PRIOR APPLICATION DATA:
; APPLICATION NUMBER: US 09/071,035
; FILING DATE: 1998-05-04
; APPLICATION NUMBER: US 60/046,655
; FILING DATE: 1997-05-16
; APPLICATION NUMBER: US 60/044,031
; FILING DATE: 1997-05-06
; APPLICATION NUMBER: US 60/066,009
; FILING DATE: 1997-11-14
; ATTORNEY/AGENT INFORMATION:
; NAME: Hyman, Mark J.
; REGISTRATION NUMBER: 46,789
; REFERENCE/DOCKET NUMBER: PB369P1D1
; INFORMATION FOR SEQ ID NO: 394:
; SEQUENCE CHARACTERISTICS:
; LENGTH: 1074 amino acids
; TYPE: amino acid
; STRANDEDNESS: single
; TOPOLOGY: linear
; MOLECULE TYPE: protein
; SEQUENCE DESCRIPTION: SEQ ID NO: 394:
US-10-206-576-394

Query Match
  2.0%; Score 123; DB 12; Length 1074;
Best Local Similarity 18.3%; Pred. No. 0.078;
Matches 206; Conservative 150; Mismatches 415; Indels 352; Gaps 52;

QY 250 RVRNVTAVARGAAHLAFDENHEGAVLPDPITYTFQSSSGTTTARGARRNDVNSTSKPS 309
DB 67 RTTSLYAEVNGAKQVFC-IEPGVSIPTVTHGY-----QKNPL 104

QY 310 PSGGFERRIASIM--AATLHAEVINTGTIYEE-----TPTDIKWPMPFI 353
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Db 712 ----VSGVHRKNKRDLIHRRRGDSTLRRPRE--HRRQLPLSARRIDPQWAAALLEKAKK 765

Qy 848 NQPADKLTHERIT--IAAVKRFTEEYAAINFILNPPCTICIGELAQFYMANLILK 900

Db 766 NSVP----KQENTTVKVPPLAVPLVLTDEEKDASGM--PP-----802

Qy 901 YCHDSOYLINTLSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEKTENLPELM 960

Db 803 --DEEFVWLTKASGVPGSRPTADSGPVNHGFMSTIASGTEVSTVNPQTQ--SEHLPDFK 859

Qy 961 TTAFTSTHLVRAM-----NORPMVLGISISKYHGAAGNRRVFOAGNWSG--1006

Db 860 LFSVTNGTAVTKSMNPSIAKIEDTTNQNPILIFP--SVAEIRDSA-----QAGRASSQS 912

Qy 1007 ---LNGGKNVCPPLFTFDRTRERFIACPRGGFI-----CPVTG---PSSGN 1045

Db 913 AHPVTGNN---MATYGHNTYSSFTSKASTVLQPINPTESYGPQIPITGVSRPSSSD 966

RESULT 14

US-09-905-129-10

Sequence 10, Application US/09905129

Patent No. US20020137705A1

GENERAL INFORMATION:

APPLICANT: Einat, et al

TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE

TITLE OF INVENTION: AND USES THEREOF

FILE REFERENCE: 540579-2007.2

CURRENT APPLICATION NUMBER: US/09/905,129

CURRENT FILING DATE: 2001-07-13

PRIOR APPLICATION NUMBER: 09/802,318

PRIOR FILING DATE: 2001-03-08

PRIOR FILING DATE: 2000-05-30

PRIOR FILING DATE: 2000-05-30

PRIOR FILING DATE: 1998-05-11

PRIOR FILING DATE: 1998-05-11

PRIOR FILING DATE: 1998-05-15

NUMBER OF SEQ ID NOS: 25

SOFTWARE: Patent in version 3.0

SEQ ID NO 10

LENGTH: 2597

TYPE: PRT

ORGANISM: Rattus sp.

FEATURE:

NAME/KEY: misc_feature

LOCATION: (1)..(2597)

OTHER INFORMATION: 'x' can be any amino acid

US-09-905-129-10

Query Match 1.9%; Score 120.5; DB 9; Length 2597;

Best Local Similarity 18.6%; Pred. No. 0.67; Indels 233; Gaps 40;

Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

Qy 416 AGPHLAANPQTD---RDGHVLSQSQTSSNTE-----FSDVYLALICG 455

Db 274 SGAFCTKPTIDPSLKSKSLVTQEDNGSASTSPQDFTPEFGSLSLNMTXXSGNKADMVCS 333

Qy 456 FGAPLLARLLFYLERCDAGFTGGHGAALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511

Db 334 IQKP-----SRSTPTAFTENDYIM--LNASFSTNLVCSVDYNHQIOWMOLALYS 382

Qy 512 TVHRLRQMP-----RFGATRQPIGVFTGMSQYSDCDPLGNVAPYLILRKPGD 561

Db 383 DSPILERKPPQLTPTSLSSRYKQVALRPEDIFTSIEADYR-ADPFWFQEKIVLQNLRT 441

Qy 562 QTEAAKATMQTYRATUERFIDLEQRL-----LDR-----GAPCSSEG 601

Db 442 ATTLSLQIQPSTDAQIALPRAEMARLKWMTLMNPNKLERTVLVGGTIALSCPGKG 501

Qy 602 ----LSSVIVDHPTFR-----RILDTLRARIE-OTTQFMKVL---VETRD-----639

Db 502 DPSHLEWLLADGSKVRAPYVSEGRILLIDKNGLKLEQMAQDSFAGLYHCISTNDADAV 561

Qy 640 --YKIR--EGLSEATHSMALTFDPYSGAF-----CPITNFLVKRTHLAVVQDLALSQCCHV 691

Db 562 LYIRITVVEPYGESHTDSGVQHTVVTGETLDELCLSTG-----VPDASIS--WI 608

Qy 692 FYGQOQVEGFENQOPVLRFRFVDFLFGGGFISTRSITVTLSSEGPVS--APNPT-----743

Db 609 LFGNTVFSQPSRDR-----QILANGTLRLILQVLT--PKDQGHYQCVAAANPSGADFSS 657

Qy 744 ----LGQDAPAGRTFDGDLARVSEVIRDIRVKNRVVFSGNCTNLSEAAAR 791

Db 658 FKVSQVKKQORVVEHREAGGSLGE--FNSSVSLKQAPASLK---LSASALTGSAGKQ- 711

Qy 792 LVGLASAVORQERKRVMDLHGALG--FLKQFHGLLPFRGMPNPSKSPNQFWTLIQ---R 847

Db 712 ----VSGVHRKNKRDLIHRRRGDSTLRRPRE--HRRQLPLSARRIDPQWAAALLEKAKK 765

Qy 848 NQPADKLTHERIT--IAAVKRFTEEYAAINFILNPPCTICIGELAQFYMANLILK 900

Db 766 NSVP----KQENTTVKVPPLAVPLVLTDEEKDASGM--PP-----802

Qy 901 YCHDSOYLINTLSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEKTENLPELM 960

Db 803 --DEEFVWLTKASGVPGSRPTADSGPVNHGFMSTIASGTEVSTVNPQTQ--SEHLPDFK 859

Qy 961 TTAFTSTHLVRAM-----NORPMVLGISISKYHGAAGNRRVFOAGNWSG--1006

Db 860 LFSVTNGTAVTKSMNPSIAKIEDTTNQNPILIFP--SVAEIRDSA-----QAGRASSQS 912

Qy 1007 ---LNGGKNVCPPLFTFDRTRERFIACPRGGFI-----CPVTG---PSSGN 1045

Db 913 AHPVTGNN---MATYGHNTYSSFTSKASTVLQPINPTESYGPQIPITGVSRPSSSD 966

RESULT 15

US-09-905-129-13

Sequence 13, Application US/09905129

Patent No. US20020137705A1

GENERAL INFORMATION:

APPLICANT: Einat, et al

TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE

TITLE OF INVENTION: AND USES THEREOF

FILE REFERENCE: 540579-2007.2

CURRENT APPLICATION NUMBER: US/09/905,129

CURRENT FILING DATE: 2001-07-13

PRIOR APPLICATION NUMBER: 09/802,318

PRIOR FILING DATE: 2001-03-08

PRIOR APPLICATION NUMBER: 60/207,821

PRIOR FILING DATE: 2000-05-30

PRIOR APPLICATION NUMBER: 60/084,944

PRIOR FILING DATE: 1998-05-11

PRIOR APPLICATION NUMBER: 60/085,673

PRIOR FILING DATE: 1998-05-15

NUMBER OF SEQ ID NOS: 25

SOFTWARE: Patent in version 3.0

SEQ ID NO 13

LENGTH: 2597

TYPE: PRT

ORGANISM: Rattus sp.

FEATURE:

NAME/KEY: misc_feature

LOCATION: (1)..(2597)

OTHER INFORMATION: 'x' can be any amino acid

US-09-905-129-13

Query Match 1.9%; Score 120.5; DB 9; Length 2597;

Best Local Similarity 18.6%; Pred. No. 0.67; Indels 233; Gaps 40;

Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

Qy 416 AGPHLAANPQTD---RDGHVLSQSQTSSNTE-----FSDVYLALICG 455

Db 274 SGAFCTKPTIDPSLKSKSLVTQEDNGSASTSPQDFTPEFGSLSLNMTXXSGNKADMVCS 333

QY 456 FGAPLLARLLFYLERCDAGAFGGHGDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
Db 334 IQKP-----SRTSPTAFTEENDYIM--LNASFSNLVCSVDYNIHQVWQALLAYS 382
QY 512 TVHRLRQMP-----RFGQATROPFGVGTMSQYSDCDPLGNAYAPYLILRKPGD 561
Db 383 DSPLILERKPOLTEPSSLSRYKQVALRPEDIFTSIEADV--ADPFWFQOEKIVLQNLRT 441
QY 562 QTEAAKATMODTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
Db 442 ATTLSTLQIOFSDAQIALPRAEMRAERLKWMTILMNNPKLERTVLVGGTIALSCPGKG 501
QY 602 -----LSSVIVDHPTR-----RILDTLRARIE-OTTTFQMKVL---VETRD----- 639
Db 502 DSPHLEWLLADGSKVRAPYVSEDGRILIDKNGKLEQWADSFAGLYHCHCISTNDADAV 561
QY 640 --YKIR--EGLSEATHSMALTFDPYSGAF---CPITNFKVTRHLAVVQDLALSOCHCV 691
Db 562 LTYRITVVEPYGESTHDSGVQHTVVTGETLDLPCLSTG-----VPDASIS---WI 608
QY 692 FYGQOQVEGRFNQOPVLRRRFRVDFLNGGFTSTRSITVTLSSEGPVS--APNPT----- 743
Db 609 LPGNTVFSQPSRDR-----QILNNGTLRILOVT-PKQOQHYQCVAAANPSGADPSS 657
QY 744 -----LGQDAPAGRTFDGDLARVSVEVIRDIRVKNRVVFGSGNCTNLSEARAR 791
Db 658 FKVSQVKQGMVHEHREAGGSLGS-PNSSVSLKQPASLK-----LSASALTGSEAGKQ- 711
QY 792 LVGLASAYQOEKRVDMHLGALG-FLKQFHGLLFFRGMPNPSKSPNPFQWFTILQ---R 847
Db 712 ----VSGVHRKNKRDILHRRRGDSTLRFR--HRRQLPSARRIDPQWAAALLEKAKK 765
QY 848 NOMPADKLTHEITTT-----IAAVKRFTEEYAAINFNLPPPTCIGELAQFYMANLILK 900
Db 766 NSVP-----KKQENTTVKPVPLVPLVELTDEKDSGMI--PP----- 802
QY 901 YCDHSOYLINTLTSITGARRPRDPSSVLHWRKDVTSAAIDTQAKALLEKTENLPELW 960
Db 803 --DEEFNVLTKASGVPGERSPTADSGPVNKGFTWSTIASGTETVSTVNPQTLO-SEHLPDFK 859
QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFQAGNWSG-- 1006
Db 860 LFSVTNGTAVTKSMNPSIASKIEDTTNQNPILIFP-SVAEIRDSA-----QAGRASSQS 912
QY 1007 ---LNGGKNVCPLFTDRTRRFIIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN---MATYGHNTVTSSTSKASTVLQPINPTESYGPQIPITGVSRPSSSD 966

RESULT 16

US-09-991-630-2
; Sequence 2, Application US/09991630
; Patent No. US20020151514A1
; GENERAL INFORMATION:
; APPLICANT: Einat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; FILE REFERENCE: 540579-2007.3
; CURRENT APPLICATION NUMBER: US/09/991,630
; CURRENT FILING DATE: 2001-11-06
; PRIOR APPLICATION NUMBER: 09/905,129
; PRIOR FILING DATE: 2001-07-13
; PRIOR APPLICATION NUMBER: 09/802,318
; PRIOR FILING DATE: 2001-03-08
; PRIOR APPLICATION NUMBER: 09/729,485
; PRIOR FILING DATE: 2000-12-04
; NUMBER OF SEQ ID NOS: 28
; SOFTWARE: PatentIn version 3.0
; SEQ ID NO 2
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus species
; FEATURE:

; NAME/KEY: misc feature
; LOCATION: (1)_(2597)
; OTHER INFORMATION: 'x' can be any amino acid
US-09-991-630-2

Query Match 1.9%; Score 120.5; DB 9; Length.2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPHLAANPQTD---RDGHVLSQSSTGSSNTE-----FSDVYLALICG 455
Db 274 SGAPLCTKPTIDPSLSKSLVTOEDNGSASTSPQDIEFPGSLSLANTYXSGKAMDVCS 333
QY 456 FGAPLLARLLFYLERCDAGAFGGHGDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
Db 334 IQKP-----SRTSPTAFTEENDYIM--LNASFSNLVCSVDYNIHQVWQALLAYS 382
QY 512 TVHRLRQMP-----RFGQATROPFGVGTMSQYSDCDPLGNAYAPYLILRKPGD 561
Db 383 DSPLILERKPOLTEPSSLSRYKQVALRPEDIFTSIEADV--ADPFWFQOEKIVLQNLRT 441
QY 562 QTEAAKATMODTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
Db 442 ATTLSTLQIOFSDAQIALPRAEMRAERLKWMTILMNNPKLERTVLVGGTIALSCPGKG 501
QY 602 -----LSSVIVDHPTR-----RILDTLRARIE-OTTTFQMKVL---VETRD----- 639
Db 502 DSPHLEWLLADGSKVRAPYVSEDGRILIDKNGKLEQWADSFAGLYHCHCISTNDADAV 561
QY 640 --YKIR--EGLSEATHSMALTFDPYSGAF---CPITNFKVTRHLAVVQDLALSOCHCV 691
Db 562 LTYRITVVEPYGESTHDSGVQHTVVTGETLDLPCLSTG-----VPDASIS---WI 608
QY 692 FYGQOQVEGRFNQOPVLRRRFRVDFLNGGFTSTRSITVTLSSEGPVS--APNPT----- 743
Db 609 LPGNTVFSQPSRDR-----QILNNGTLRILOVT-PKQOQHYQCVAAANPSGADPSS 657
QY 744 -----LGQDAPAGRTFDGDLARVSVEVIRDIRVKNRVVFGSGNCTNLSEARAR 791
Db 658 FKVSQVKQGMVHEHREAGGSLGS-PNSSVSLKQPASLK-----LSASALTGSEAGKQ- 711
QY 792 LVGLASAYQOEKRVDMHLGALG-FLKQFHGLLFFRGMPNPSKSPNPFQWFTILQ---R 847
Db 712 ----VSGVHRKNKRDILHRRRGDSTLRFR--HRRQLPSARRIDPQWAAALLEKAKK 765
QY 848 NOMPADKLTHEITTT-----IAAVKRFTEEYAAINFNLPPPTCIGELAQFYMANLILK 900
Db 766 NSVP-----KKQENTTVKPVPLVPLVELTDEKDSGMI--PP----- 802
QY 901 YCDHSOYLINTLTSITGARRPRDPSSVLHWRKDVTSAAIDTQAKALLEKTENLPELW 960
Db 803 --DEEFNVLTKASGVPGERSPTADSGPVNKGFTWSTIASGTETVSTVNPQTLO-SEHLPDFK 859
QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFQAGNWSG-- 1006
Db 860 LFSVTNGTAVTKSMNPSIASKIEDTTNQNPILIFP-SVAEIRDSA-----QAGRASSQS 912
QY 1007 ---LNGGKNVCPLFTDRTRRFIIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN---MATYGHNTVTSSTSKASTVLQPINPTESYGPQIPITGVSRPSSSD 966

RESULT 17

US-09-991-630-10
; Sequence 10, Application US/09991630
; Patent No. US20020151514A1
; GENERAL INFORMATION:
; APPLICANT: Einat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; FILE REFERENCE: 540579-2007.3
; CURRENT APPLICATION NUMBER: US/09/991,630
; CURRENT FILING DATE: 2001-11-06

PRIOR APPLICATION NUMBER: 09/905,129
PRIOR FILING DATE: 2001-07-13
PRIOR APPLICATION NUMBER: 09/802,318
PRIOR FILING DATE: 2001-03-08
PRIOR APPLICATION NUMBER: 09/729,485
PRIOR FILING DATE: 2000-12-04
NUMBER OF SEQ ID NOS: 28
SOFTWARE: Patent in version 3.0
SEQ ID NO 10
LENGTH: 2597
TYPE: PRT
ORGANISM: Rattus species
FEATURE:
NAME/KEY: misc feature
LOCATION: (1)..(2597)
OTHER INFORMATION: 'x' can be any amino acid

US-09-991-630-10

Query Match 1.9%; Score 120.5; DB 9; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67; Indels 233; Gaps 40;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPHLAANPQD---RDGHVLSQSQTGSNTE-----PSVDYLALICG 455
DB 274 SGAFELCTKPTIDPSLKSLSVTQEDNGSASTSPQDFTIEFGSLSLNMTXXSGNKADWVCS 333
QY 456 FGAPLLARLLFYLERCDAGFTGGHGDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
DB 334 IQKP-----SRTSPTAFTENDYIM--LNASFSTNLVCSVDYHNIQVWQLLALYS 382
QY 512 TVHRLRQMP-----RFGQATRPQIGVFTGNSQYSDCDPLGNVAPYLILRKPQD 561
DB 383 DSPILILRKPQLTPTPSLSRYKQVALRPEDIFTSTIADVR--ADPFWFQOEKIVLQNLRT 441
QY 562 QTEAAKATMDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
DB 442 ATTSLTQIQFSTDAQIALPRAEMRAERLKWMLMNNPKLERTVLVGGTIALSCPGKG 501
QY 602 -----LSGVVDHPTFR-----RILDTLRARIE-OTTQFMKVL---VETRD----- 639
DB 502 DSPHLEWLLADGSKVAPYVSEDGRILIDKNGKLEQWADSDFAGLYHCHISTNDADAV 561
QY 640 --YKIR--EGLSEATHSMALTFDPYSGAF---CPITNFLVKRTHLAVVQDLALSOCHV 691
DB 562 LTYRITVVEPYGESTHDSGVQHTVVTGETLDLPCLSGTG-----VPDASIS---WI 608
QY 692 FYGQOQVEGRNFRNFPQVLRERRFVLDLNGGFTSTRITVTLSEGPVS--APNPT----- 743
DB 609 LPGNVTVFSQPSRDR-----QILNNGTILRLQVT--PKDQGHYQCVAAVPSGADFSS 657
QY 744 -----LGQDAPAGRTFDGDLARVSVEVIRDIRVKNRVVFGSGNCTNLSEAAAR 791
DB 658 FKVSQKQGVQKQVVEHREAGGSLGE--PNSSVSLKQPASLK-----LSASALTGSEAGKQ- 711
QY 792 LVGLASAYQOEKRVDMHLGALG--FLKQFHGLLFPFGMPNPSKSPNPQWFTLLQ---R 847
DB 712 ---VSGVHRKHKHRLIHRRGDSTLRRFRE--HRRQLPLSARRIDPQWMAALLERAKK 765
QY 848 NOMPADKLTHEEITT-----IAAYKFTTEYAAINFINLPPTCIGELAQFYMANLILK 900
DB 766 NSVP-----KQOENTVVKPVLAVPLVELTDEKQASGMI--PP----- 802
QY 901 YCDHSEYLVNLTLSITIGARRPRPSSVLHWRKDVISAADIETQAKALLEKTENLPELW 960
DB 803 ---DEEFVWLTKASGVPSRSTADSGPVNHHGFMISIASGTEVSTVNPQTLLQ--SEHLPDFK 859
QY 961 TTAFTSTHVLRAAM-----NORPMVVLGISISKYHGAAGNNRVFQAGNWSG-- 1006
DB 860 LFSVTNGTAVTKSMNPSASKIEDTTNQNFIIIFP--SVAETIRDSA-----QAGRASSQS 912
QY 1007 ---LNGGVNVCLEFTFDRTRFLIACPSGGFI-----CPVTG---PSSGN 1045
DB 913 AHPVTGGN-----MATYGHNTYISSFTSKASTVLQPINPTESYGQPIITGVSRSSSD 966

RESULT 18

US-09-991-630-13
Sequence 13, Application US/09991630
Patent No. US2002015154A1
GENERAL INFORMATION:

APPLICANT: Einat, et al
TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THEREOF
FILE REFERENCE: 540579-2007.3
CURRENT APPLICATION NUMBER: US/09/991,630
CURRENT FILING DATE: 2001-11-06
PRIOR APPLICATION NUMBER: 09/905,129
PRIOR FILING DATE: 2001-07-13
PRIOR APPLICATION NUMBER: 09/802,318
PRIOR FILING DATE: 2001-03-08
PRIOR APPLICATION NUMBER: 09/729,485
PRIOR FILING DATE: 2000-12-04
NUMBER OF SEQ ID NOS: 28
SOFTWARE: Patent in version 3.0
SEQ ID NO 13
LENGTH: 2597
TYPE: PRT
ORGANISM: Rattus species
FEATURE:
NAME/KEY: misc feature
LOCATION: (1)..(2597)
OTHER INFORMATION: 'x' can be any amino acid

US-09-991-630-13

Query Match 1.9%; Score 120.5; DB 9; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67; Indels 233; Gaps 40;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPHLAANPQD---RDGHVLSQSQTGSNTE-----PSVDYLALICG 455
DB 274 SGAFELCTKPTIDPSLKSLSVTQEDNGSASTSPQDFTIEFGSLSLNMTXXSGNKADWVCS 333
QY 456 FGAPLLARLLFYLERCDAGFTGGHGDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
DB 334 IQKP-----SRTSPTAFTENDYIM--LNASFSTNLVCSVDYHNIQVWQLLALYS 382
QY 512 TVHRLRQMP-----RFGQATRPQIGVFTGNSQYSDCDPLGNVAPYLILRKPQD 561
DB 383 DSPILILRKPQLTPTPSLSRYKQVALRPEDIFTSTIADVR--ADPFWFQOEKIVLQNLRT 441
QY 562 QTEAAKATMDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
DB 442 ATTSLTQIQFSTDAQIALPRAEMRAERLKWMLMNNPKLERTVLVGGTIALSCPGKG 501
QY 602 -----LSGVVDHPTFR-----RILDTLRARIE-OTTQFMKVL---VETRD----- 639
DB 502 DSPHLEWLLADGSKVAPYVSEDGRILIDKNGKLEQWADSDFAGLYHCHISTNDADAV 561
QY 640 --YKIR--EGLSEATHSMALTFDPYSGAF---CPITNFLVKRTHLAVVQDLALSOCHV 691
DB 562 LTYRITVVEPYGESTHDSGVQHTVVTGETLDLPCLSGTG-----VPDASIS---WI 608
QY 692 FYGQOQVEGRNFRNFPQVLRERRFVLDLNGGFTSTRITVTLSEGPVS--APNPT----- 743
DB 609 LPGNVTVFSQPSRDR-----QILNNGTILRLQVT--PKDQGHYQCVAAVPSGADFSS 657
QY 744 -----LGQDAPAGRTFDGDLARVSVEVIRDIRVKNRVVFGSGNCTNLSEAAAR 791
DB 658 FKVSQKQGVQKQVVEHREAGGSLGE--PNSSVSLKQPASLK-----LSASALTGSEAGKQ- 711
QY 792 LVGLASAYQOEKRVDMHLGALG--FLKQFHGLLFPFGMPNPSKSPNPQWFTLLQ---R 847
DB 712 ---VSGVHRKHKHRLIHRRGDSTLRRFRE--HRRQLPLSARRIDPQWMAALLERAKK 765
QY 848 NOMPADKLTHEEITT-----IAAYKFTTEYAAINFINLPPTCIGELAQFYMANLILK 900

Db 766 NSVP-----KKQNTTVPVPLAVPLVELTDEKDSAGMI--PP----- 802
Qy 901 YCDHSQLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEKTENLPELW 960
Db 803 --DEEFVVLTKASGVGRSPADSGPVNHGFMTSIASGTEVSTVNPQTLO--SEHLPDFK 859
Qy 961 TTAFTSTHLVRAAM-----NQSPMVVLGISIKYHGAAGNNRVFOAGNWSG-- 1006
Db 860 LFSVTNGTAVTKSMNPISAKIEDTTNQNPIIIFP--SVAEIRDSA-----QAGRASSQS 912
Qy 1007 ---LNGGKNVCPLFTDRRRIIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN-----MATYGHNTYSSFTSKASTVLQPINPTESYGPQIPITGVSRPSSD 966

RESULT 19
US-10-454-351-2
; Sequence 2, Application US/10454351
; Publication No. US20040053301A1
; GENERAL INFORMATION:
; APPLICANT: Quark Biotech Inc.; Paz Einat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; TITLE OF INVENTION: AND USES THEREOF
; FILE REFERENCE: 010/PCT2-US2; EINAT=7E
; CURRENT APPLICATION NUMBER: US/10/454,351
; CURRENT FILING DATE: 2003-06-04
; PRIOR APPLICATION NUMBER: US 09/991,630
; PRIOR FILING DATE: 2001-11-06
; PRIOR APPLICATION NUMBER: US 09/905,129
; PRIOR FILING DATE: 2001-07-13
; PRIOR APPLICATION NUMBER: US 09/802,318
; PRIOR FILING DATE: 2001-03-08
; PRIOR APPLICATION NUMBER: US 09/729,485
; PRIOR FILING DATE: 2000-12-04
; PRIOR APPLICATION NUMBER: US 09/312,216
; PRIOR FILING DATE: 1999-05-14
; NUMBER OF SEQ ID NOS: 37
; SOFTWARE: Patentin version 3.0
; SEQ ID NO 2
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus species
; FEATURE:
; NAME/KEY: misc feature
; LOCATION: (1)-(2597)
; OTHER INFORMATION: 'x' can be any amino acid
US-10-454-351-2

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

Qy 416 AGPHLAANPQTD---RDGHVLSQSOSTGSSNTE-----FSDVYLALICG 455
Db 274 SGAFCLCTKPTIDPSLKSGLVTQEDNGSASTSPQDFIEFGSLSLNMTXXSGNKADMVCS 333

Qy 456 FGAPILARLLYLRCDAGFTGHHGALKVVTGTFDSEIPSCICEKTRPV-----CAHT 511
Db 334 IQKP-----SRTSTFATEENDYIM--LNASFSTNLVCSVDYNNHIQPVWQLALYS 382

Qy 512 TVHRLRQMP-----RFGATROPICVFGTMSQYSDCDPLGNYPYLILRPGD 561
Db 383 DSPILIERKPOLUTETPSLSRYKQVALRPEIDFTSIADVR-ADPFWFQOEKIVLQNR 441

Qy 562 QTEAAKATMOTYTRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
Db 442 ATTLLTLOIQTSDAQIALPRAEMRAERLKWMLMNNPKLRTVLVGGTIALSCPGKG 501

Qy 602 -----LSSVIVDHPTR-----RILDTLRAIE-OTTQFMKVL---VETRD----- 639
Db 502 DPSPLEMLLADGSKVRAPYVSEDRILIDKNGKLEQADSFAGLYHCISTNDADADY 561

Qy 640 --YKIR--EGUSEATHSWALTFDPVSGAF----CPITFLVKRTHLAVVQDLALSQCHCV 691

Db 562 LTRITVVEPYGESTHDSGVQHVTVTGETLDELCLSTG-----VPDAISIS--WI 608
Qy 692 FYGQVEGRNFRNQFQVPLRRRFDVLFNGFISTRTITVTLSEGPVS--APNT----- 743
Db 609 LPGNTVFSQPSRDR-----QILNNGTLRILOVT-PKQGHYQCVAANPSGADFSS 657
Qy 744 -----LGQDAPAGETFDGLARVSVEIRDIVKKNRVFSGNCTNLSEAPAR 791
Db 658 FKVSQVKQGMVHEHREAGGSLGE--PNSSVLKKQASLK-----LSASALTGSEAGKQ- 711
Qy 792 LVGLASAYQREQKRVMDMLHGALG--FLKQFPHGLLFRGMPNPNKSPNPQWFTLLQ--R 847
Db 712 ----VSGVHRKNKXRDLIHRRRGDSTLRRFE--HRRQLPLSARRIDPQSWAALLERAKK 765
Qy 848 NQMPADKLTHEEIT-----TAAVKRFTVEEVAANFINLPTCTICELGAQFYMANLILK 900
Db 766 NSVP-----KKQNTTVPVPLAVPLVELTDEKDSAGMI--PP----- 802
Qy 901 YCDHSQLINTLTSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALLEKTENLPELW 960
Db 803 --DEEFVVLTKASGVGRSPADSGPVNHGFMTSIASGTEVSTVNPQTLO--SEHLPDFK 859
Qy 961 TTAFTSTHLVRAAM-----NQSPMVVLGISIKYHGAAGNNRVFOAGNWSG-- 1006
Db 860 LFSVTNGTAVTKSMNPISAKIEDTTNQNPIIIFP--SVAEIRDSA-----QAGRASSQS 912
Qy 1007 ---LNGGKNVCPLFTDRRRIIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN-----MATYGHNTYSSFTSKASTVLQPINPTESYGPQIPITGVSRPSSD 966

RESULT 20
US-10-454-351-10
; Sequence 10, Application US/10454351
; Publication No. US20040053301A1
; GENERAL INFORMATION:
; APPLICANT: Quark Biotech Inc.; Paz Einat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; TITLE OF INVENTION: AND USES THEREOF
; FILE REFERENCE: 010/PCT2-US2; EINAT=7E
; CURRENT APPLICATION NUMBER: US/10/454,351
; CURRENT FILING DATE: 2003-06-04
; PRIOR APPLICATION NUMBER: US 09/991,630
; PRIOR FILING DATE: 2001-11-06
; PRIOR APPLICATION NUMBER: US 09/905,129
; PRIOR FILING DATE: 2001-07-13
; PRIOR APPLICATION NUMBER: US 09/802,318
; PRIOR FILING DATE: 2001-03-08
; PRIOR APPLICATION NUMBER: US 09/729,485
; PRIOR FILING DATE: 2000-12-04
; PRIOR APPLICATION NUMBER: US 09/312,216
; PRIOR FILING DATE: 1999-05-14
; NUMBER OF SEQ ID NOS: 37
; SOFTWARE: Patentin version 3.0
; SEQ ID NO 10
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus species
; FEATURE:
; NAME/KEY: misc feature
; LOCATION: (1)-(2597)
; OTHER INFORMATION: 'x' can be any amino acid
US-10-454-351-10

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

Qy 416 AGPHLAANPQTD---RDGHVLSQSOSTGSSNTE-----FSDVYLALICG 455
Db 274 SGAFCLCTKPTIDPSLKSGLVTQEDNGSASTSPQDFIEFGSLSLNMTXXSGNKADMVCS 333

QY 456 FGAPLLARLLFYLERCDAGFTGGHGDALKVYVCTGTFDSEIPCSLCEKHTRPV-----CAHT 511
 Db 334 IQKP-----SRTSPTAFTEENDYIM--LNASFSTNLVCSVDYVNHQIPVWQOLLALYS 382
 QY 512 TVHRLRORMP-----RFGQATROPIGVFGTMMNSQYSDCDPLGNYAPYLILRKPGD 561
 Db 383 DSPILILRKQQLTETPSLSRYKQVALRPEDIFTSIEADV-ADPFWFOQEKIVLQNLRT 441
 QY 562 QTEAAKATMDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
 Db 442 ATTSLTLOQFSTDAQIALPRAEMRAERLKWMTILMNNPKLERTVLVGGTIALSCPGKG 501
 QY 602 -----LSSVIVDHPFTR-----RILDLARIE-OTTTOFMKVL-----VETRD----- 639
 Db 502 DPSHLEWLLADGSKVRAPYVSEGRILIDKNGKLEQADSFAGLYHCISTNDADAV 561
 QY 640 --YKIR--EGLSEATHSMALTFDPYSQAF-----CPITNFLVKRTHLAVQDLALSCQCHV 691
 Db 562 LTYRIITVVEPYGESHTDSGVQHTVVTGETLDLPCLSGT-----VPDASIS--WI 608
 QY 692 FYGQOQVEGRNFRNQFVLRERRFDVLFNGGFISTRSITVTLSEGPVS--APNPT----- 743
 Db 609 LPGNTVFSQPSRDR-----QILNNGTLRILOVT-PKDQGHYQCVAAANPSGADFS 657
 QY 744 -----LGQAPAGRTFDGLARVSEVIRDIRVKNRVVFGNCTNLSEAAAR 791
 Db 658 FKVSQVKQGRVHEHREAGSGLGE-PNSVSLKQPSLK-----LSASALTGSEAGKQ- 711
 QY 792 LVGLASAYQREKRVDMHLGALG-FLKQPHGLLFPFGMPNPSKSPNPOFWTLQ---R 847
 Db 712 ---VSGVHRKXKHRLIHRRGDSTLRFRF--HRRQLPLSARRIDPQVWAALEKAKK 765
 QY 848 NMPADKLTHEEIT-----IAAVKFTTEEYAAINFILNPTCIGELAQFYMANLILK 900
 Db 766 NSVP-----KKQENTTVKPVPLAVPLVELTDEKASGMI--PP----- 802
 QY 901 YCDHSQYLINTLTSIITGARRPRDPSSVLHWRKDVTSAAIDETQAKALLEKTENLPELW 960
 Db 803 --DEEFWLKTKASGVGRSPTADSGPVNHGFMFTSIASGTEVSTVNPOTLQ-SEHLPDFK 859
 QY 961 TTATSTHLVRAAM-----NORPMVVLGISISKYHGAAGNRRVFOAGNWSG-- 1006
 Db 860 LFSVTNGTAVTKSMNPFSIAKIEDTTNQNPIIIPP-SVAEIRDSA-----QAGRASSQS 912
 QY 1007 ---LNGGKNVCPLTFDTRTRFIACPRGFI-----CPVTG---PSSGN 1045
 Db 913 AHPVTGNN-----MATYGHNTYSSFTSKASTVLOPINPTESYGPQIPITGVSRPSSSD 966

RESULT 21
 US-10-454-351-13
 ; Sequence 13, Application US/10454351
 ; Publication No. US20040053301A1
 ; GENERAL INFORMATION:
 ; APPLICANT: Quark Biotech Inc.; Paz Binat, et al
 ; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
 ; FILE OF INVENTION: AND USES THEREOF
 ; FILE REFERENCE: 010/PCT-US2; EINAT=7E
 ; CURRENT APPLICATION NUMBER: US/10/454,351
 ; CURRENT FILING DATE: 2003-06-04
 ; PRIOR APPLICATION NUMBER: US 09/991,630
 ; PRIOR FILING DATE: 2001-11-06
 ; PRIOR APPLICATION NUMBER: US 09/905,129
 ; PRIOR FILING DATE: 2001-07-13
 ; PRIOR APPLICATION NUMBER: US 09/802,318
 ; PRIOR FILING DATE: 2001-03-08
 ; PRIOR APPLICATION NUMBER: US 09/729,485
 ; PRIOR FILING DATE: 2000-12-04
 ; PRIOR APPLICATION NUMBER: US 09/312,216
 ; PRIOR FILING DATE: 1999-05-14
 ; NUMBER OF SEQ ID NOS: 37
 ; SOFTWARE: PatentIn version 3.0
 ; SEQ ID NO 13

; LENGTH: 2597
 ; TYPE: PRT
 ; ORGANISM: Rattus species
 ; FEATURE:
 ; NAME/KEY: misc.feature
 ; LOCATION: (1)..(2597)
 ; OTHER INFORMATION: 'x' can be any amino acid
 US-10-454-351-13

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
 Best Local Similarity 18.6%; Pred. No. 0.67;
 Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPHLAANPQTD---RDGHVLSQSQTSGSNTS-----FSDVYLALICG 455
 Db 274 SGAFLCTKTIDPSLKSLSLVQEDNGSASTSQDFIEFFGSLSLNMTXSGKADWVCS 333
 QY 456 FGAPLLARLLFYLERCDAGFTGGHGDALKVYVCTGTFDSEIPCSLCEKHTRPV-----CAHT 511
 Db 334 IQKP-----SRTSPTAFTEENDYIM--LNASFSTNLVCSVDYVNHQIPVWQOLLALYS 382
 QY 512 TVHRLRORMP-----RFGQATROPIGVFGTMMNSQYSDCDPLGNYAPYLILRKPGD 561
 Db 383 DSPILILRKQQLTETPSLSRYKQVALRPEDIFTSIEADV-ADPFWFOQEKIVLQNLRT 441
 QY 562 QTEAAKATMDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
 Db 442 ATTSLTLOQFSTDAQIALPRAEMRAERLKWMTILMNNPKLERTVLVGGTIALSCPGKG 501
 QY 602 -----LSSVIVDHPFTR-----RILDLARIE-OTTTOFMKVL-----VETRD----- 639
 Db 502 DPSHLEWLLADGSKVRAPYVSEGRILIDKNGKLEQADSFAGLYHCISTNDADAV 561
 QY 640 --YKIR--EGLSEATHSMALTFDPYSQAF-----CPITNFLVKRTHLAVQDLALSCQCHV 691
 Db 562 LTYRIITVVEPYGESHTDSGVQHTVVTGETLDLPCLSGT-----VPDASIS--WI 608
 QY 692 FYGQOQVEGRNFRNQFVLRERRFDVLFNGGFISTRSITVTLSEGPVS--APNPT----- 743
 Db 609 LPGNTVFSQPSRDR-----QILNNGTLRILOVT-PKDQGHYQCVAAANPSGADFS 657
 QY 744 -----LGQAPAGRTFDGLARVSEVIRDIRVKNRVVFGNCTNLSEAAAR 791
 Db 658 FKVSQVKQGRVHEHREAGSGLGE-PNSVSLKQPSLK-----LSASALTGSEAGKQ- 711
 QY 792 LVGLASAYQREKRVDMHLGALG-FLKQPHGLLFPFGMPNPSKSPNPOFWTLQ---R 847
 Db 712 ---VSGVHRKXKHRLIHRRGDSTLRFRF--HRRQLPLSARRIDPQVWAALEKAKK 765
 QY 848 NMPADKLTHEEIT-----IAAVKFTTEEYAAINFILNPTCIGELAQFYMANLILK 900
 Db 766 NSVP-----KKQENTTVKPVPLAVPLVELTDEKASGMI--PP----- 802
 QY 901 YCDHSQYLINTLTSIITGARRPRDPSSVLHWRKDVTSAAIDETQAKALLEKTENLPELW 960
 Db 803 --DEEFWLKTKASGVGRSPTADSGPVNHGFMFTSIASGTEVSTVNPOTLQ-SEHLPDFK 859
 QY 961 TTATSTHLVRAAM-----NORPMVVLGISISKYHGAAGNRRVFOAGNWSG-- 1006
 Db 860 LFSVTNGTAVTKSMNPFSIAKIEDTTNQNPIIIPP-SVAEIRDSA-----QAGRASSQS 912
 QY 1007 ---LNGGKNVCPLTFDTRTRFIACPRGFI-----CPVTG---PSSGN 1045
 Db 913 AHPVTGNN-----MATYGHNTYSSFTSKASTVLOPINPTESYGPQIPITGVSRPSSSD 966

RESULT 22
 US-09-729-485A-2
 ; Sequence 2, Application US/09729485A
 ; Publication No. US20020022036A1
 ; GENERAL INFORMATION:
 ; APPLICANT: Quark Biotech, Inc.
 ; APPLICANT: Binat, Paz

APPLICANT: Segev, Orbit
APPLICANT: Skaliter, Rami
APPLICANT: Feinstein, Elena
APPLICANT: Faerman, Alexander
TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
FILE REFERENCE: 540579-2007
CURRENT APPLICATION NUMBER: US/09/729,485A
CURRENT FILING DATE: 2000-12-04
PRIOR FILING DATE: 2000-12-04
PRIOR APPLICATION NUMBER: 09/729,485
PRIOR FILING DATE: 2000-08-04
PRIOR FILING DATE: 2000-05-30
PRIOR FILING DATE: 2000-05-11
PRIOR FILING DATE: 1998-05-15
PRIOR APPLICATION NUMBER: 60/084,944
PRIOR APPLICATION NUMBER: 60/085,673
NUMBER OF SEQ ID NOS: 22
SOFTWARE: Patent in version 3.1
SEQ ID NO 2
LENGTH: 2597
TYPE: PRT
ORGANISM: Rattus species
FEATURE:
NAME/KEY: MISC FEATURE
LOCATION: (1)..(2597)
OTHER INFORMATION: "Xaa" can be any amino acid
US-09-729-485A-2

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPLAANPQTD---RDGHVLSSTGSSNTE-----PSVDYLALICG 455
DB 274 SGAFCTKTTIDPSLXKSLVTQEDNGSASTSPQDIEPFGSLSLNMTXXSGNKADMVCS 333
QY 456 FGAPLLARLLFYLERCDAGFTGCHGDKALXYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
DB 334 IQKP-----SRTSPTAFTENDYIM--LNASFSTNLVCSVDYHNPVWQLLALYS 382
QY 512 TVHRLRQMP-----RFGQATROPIGVFGTMNSQYSCDPLGNVAPYLILKPGD 561
DB 383 DSPILIERKPOLTTPLSSRYKQVALRPEDIFTSIEADVR-ADFPWFQEKIVQLNRT 441
QY 562 QTEAAKATMQDYTRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
DB 442 ATTLSTLQIQSTDAQIALPRAEMRAERLKWMTILMMNNPKLERTVLVGGTIALSCPGKG 501
QY 602 ----LSSVIVDHPTFR-----RIIDTLRABIE-OTTQFMKVL---VETRD----- 639
DB 502 DSPHLEWLLADGSKVRAPYVSEDEGRILIDKNKLELMQADSFAGLYHCISTNDADV 561
QY 640 --YKIR--EGLSEATHSMALTFDPYSGAF---CPITNFLVKRTHLAVQDPLALSOCHV 691
DB 562 LTYRITVVEPVGESHDGSGVHTVVTGTLPLCLSTG-----VPDASIS--WI 608
QY 692 FYGQVQEGNFRNQPVLRFRFVDLFNGGPISTRITVTLSEGPVS--APNPT----- 743
DB 609 LPGNVTFSPGSRDR-----QILNNGTLRIQLVT-PKDOGHYQCVANPNSGADPSS 657
QY 744 -----LGDAPAGRTFGDLARVSVEVIRDIRVKNRVVFGSGNCTNLSEAAAR 791
DB 658 FKVSQKQGMVREHREAGSGGLGE-PNSSVSLKQPASLK-----LNSALTGSEAGKQ- 711
QY 792 LVGLASAYQREKRYDMLHGALG-FLKQFHGLLFPFGMPNPNPQWFWTLLO---R 847
DB 712 ----VSGVHRKNKRDHLHRRRGDSTLARFRE--HRRQLPLSARRIDPQWAALEKAKK 765
QY 848 NQMPADKLTHEIIT-----IAAVKFTTEYAAINFILNPPICIGELAQFYWANLILK 900

766 NSVP-----KKOENTTVKPVFLAVFLVELTDEKDSAGMI--PP----- 802
QY 901 YCDHSQYLINTLSITGARRPRDPSSVLHWIRKDVTSAAADIETQAKALEKTNLPELM 960
DB 803 --DEEFVYLTKASGVPGSPSTADSGPVNHGFMTSIASGTETVSTVNPQTLQ--SEHLPDFK 859
QY 961 TTAFTSTHLVRAAM-----NOREPMVLGISISKYHGAAGNRRVQAGNWSG-- 1006
DB 860 LFSVTNGTAVTKSMNPSIASKIEDTTNQNPLIIP-SVAEIRDSA-----QAGRASSQS 912
QY 1007 ---LNGGKNVCPLFTFTRRRIIACPRGGFI-----CPVTG---PSSNG 1045
DB 913 AHPVTGGN-----MATYGHNTYSSPTSKASTVLQPINPTESYGPQIPITGVSRFSSSD 966

RESULT 23
US-09-729-485A-10
; Sequence 10, Application US/09729485A
; Publication No. US20020022026A1
; GENERAL INFORMATION:
; APPLICANT: Quark Biotech, Inc.
; APPLICANT: Binat, Paz
; APPLICANT: Segev, Orbit
; APPLICANT: Skaliter, Rami
; APPLICANT: Feinstein, Elena
; APPLICANT: Faerman, Alexander
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; FILE REFERENCE: 540579-2007
; CURRENT APPLICATION NUMBER: US/09/729,485A
; CURRENT FILING DATE: 2000-12-04
; PRIOR APPLICATION NUMBER: 09/729,485
; PRIOR FILING DATE: 2000-12-04
; PRIOR FILING DATE: 2000-08-04
; PRIOR APPLICATION NUMBER: 60/207,821
; PRIOR FILING DATE: 2000-05-30
; PRIOR APPLICATION NUMBER: 60/084,944
; PRIOR FILING DATE: 1998-05-11
; PRIOR APPLICATION NUMBER: 60/085,673
; PRIOR FILING DATE: 1998-05-15
; NUMBER OF SEQ ID NOS: 22
; SOFTWARE: Patent in version 3.1
; SEQ ID NO 10
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus species
; FEATURE:
; NAME/KEY: MISC FEATURE
; LOCATION: (1)..(2597)
; OTHER INFORMATION: "Xaa" can be any amino acid
US-09-729-485A-10

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGPLAANPQTD---RDGHVLSSTGSSNTE-----PSVDYLALICG 455
DB 274 SGAFCTKTTIDPSLXKSLVTQEDNGSASTSPQDIEPFGSLSLNMTXXSGNKADMVCS 333
QY 456 FGAPLLARLLFYLERCDAGFTGCHGDKALXYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
DB 334 IQKP-----SRTSPTAFTENDYIM--LNASFSTNLVCSVDYHNPVWQLLALYS 382
QY 512 TVHRLRQMP-----RFGQATROPIGVFGTMNSQYSCDPLGNVAPYLILKPGD 561
DB 383 DSPILIERKPOLTTPLSSRYKQVALRPEDIFTSIEADVR-ADFPWFQEKIVQLNRT 441
QY 562 QTEAAKATMQDYTRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
DB 442 ATTLSTLQIQSTDAQIALPRAEMRAERLKWMTILMMNNPKLERTVLVGGTIALSCPGKG 501

QY 602 -----LSGVIVDHTFR-----RILDTLRARIE-OTTQFMKVL-----VETRD----- 639
 Db 502 DPSPHLEWLLADGSKVRAPYVSEDRILIDKNGKLEQLQADSPDAGLYHICISTNDADAV 561
 QY 640 --YKIR--EGLSEATHSMALTFDYSYSAF-----CPITNFWLKRTHLAVVODLALSQCHCV 691
 Db 562 LTYRITVVEPYGESHGQVHTVVTGTLDPCLSTG-----VPDASIS--WI 608
 QY 692 FYGQOQVEGRNFRNQFPVLRFRFVDLFGNGFISTRITVTLSEGPVS--APNPT----- 743
 Db 609 LPGNTVFSQPSRDR-----QILNNGTLRLQVTP-KDQGHYQCVAAANPSGADPSS 657
 QY 744 -----LGDAPAGRTFDGLARVSVEVIRDIRVKNRVVFGSGNCTNLSEARAR 791
 Db 658 PKVSQKQGMQVHREAGSGGLGE--PNSVSLKQPASLK-----LSASALTGSEAGKQ- 711
 QY 792 LVGLASAYORQEKRVDMHLGALG--FLKQPHGLLFPFGMPNPSKSPNPQFWTILQ--R 847
 Db 712 ----VSGVHRKNKRDLLHRRRGDSTLRPRE--HRRQLPSARRIDPQWAALEKAKK 765
 QY 848 NOMPADKLTHEITTT-----IAVKRFTTEYAAINFINLPPTCIGELAQFYMANLILK 900
 Db 766 NSVP-----KKQENTTVKPVPLAVPLVELTDEKDSAGMI--PP----- 802
 QY 901 YCDHSQYLINTLTSITGARRPRDPSSVHLWRKDVTSAAADIETQAKALLEKTENLPELW 960
 Db 803 --DEEFMWLTKASGVPGRSPTADSGPVNHGFMTSASGTEVSTVNPOTLQ--SEHLPDFK 859
 QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFQAGNWGS-- 1006
 Db 860 LFSVINGTAVTKSMNPSIASKIEDTTNQNPFIIPP-SVAEIRDSA-----QAGRASSQS 912
 QY 1007 ---LNGGKNCVCLPFTDRTRFRFIACPRGGFI-----CPVTG---PSSGN 1045
 Db 913 AHPVTGGN-----MATYGHNTYSSFTSKASTVLQINPTESYGPQIPITGVSRPSSSD 966

RESULT 24
 US-09-729-485A-13
 ; Sequence 13, Application US/09729485A
 ; Publication No. US200200226A1
 ; GENERAL INFORMATION:
 ; APPLICANT: Quark Biotech, Inc.
 ; APPLICANT: Binat, Paz
 ; APPLICANT: Segev, Orbit
 ; APPLICANT: Skaliter, Rami
 ; APPLICANT: Feinstein, Elena
 ; APPLICANT: Faerman, Alexander
 ; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
 ; FILE OF INVENTION: AND USES THEREOF
 ; FILE REFERENCE: 540579-2007
 ; CURRENT APPLICATION NUMBER: US/09/729,485A
 ; CURRENT FILING DATE: 2000-12-04
 ; PRIOR APPLICATION NUMBER: 09/729,485
 ; PRIOR FILING DATE: 2000-12-04
 ; PRIOR APPLICATION NUMBER: 09/632,862
 ; PRIOR FILING DATE: 2000-08-04
 ; PRIOR APPLICATION NUMBER: 60/207,821
 ; PRIOR FILING DATE: 2000-05-30
 ; PRIOR APPLICATION NUMBER: 60/084,944
 ; PRIOR FILING DATE: 1998-05-11
 ; PRIOR APPLICATION NUMBER: 60/085,673
 ; PRIOR FILING DATE: 1998-05-15
 ; NUMBER OF SEQ ID NOS: 22
 ; SOFTWARE: PatentIn version 3.1
 ; SEQ ID NO 13
 ; LENGTH: 2597
 ; TYPE: PRT
 ; ORGANISM: Rattus species
 ; FEATURE:
 ; NAME/KEY: MISC FEATURE
 ; LOCATION: (1)-(2597)
 ; OTHER INFORMATION: "Xaa" can be any amino acid

US-09-729-485A-13
 Query Match 1.9%; Score 120.5; DB 12; Length 2597;
 Best Local Similarity 18.6%; Pred. No. 0.67;
 Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;
 QY 416 AGPHLAANQPTD---RDGHVLSQSQTSGSSNTE-----FSDVYLALIGC 455
 Db 274 SGAFCTKCTIDPSLKSLSVTQDNGSASTSPQDFIEFPGSLSLNMTXXSGKADWCVS 333
 QY 456 FGAPILARILFLYLERCDAGFTGGHGDALKYVTGTDFDSEIPCSLCEKHTRPV---CAHT 511
 Db 334 IQXP-----SRISPTAFTEENDYIM--LNASPSNTLVCSVDYNNHIQVWQLLALYS 382
 QY 512 TVERLRQRM-----RFGQATRQPIGVFTWNSQYSDCDPLGNTAPYVILILKPGD 561
 Db 383 DSPILILERKPOLTETPSLSRYKQVALREPDIETSIADVR-ADPFWFOEKKIVLOLNT 441
 QY 562 QTEAAKATQDVTYRATLERLFDLEOERL-----LDR-----GAPCSSEG 601
 Db 442 ATTSLTQIQFSDAQIALPRAEMRAERLKWMLMNNPKLERTVLVGGTIALSCPGKG 501
 QY 602 -----LSSVIVDHTFR-----RILDTLRARIE-OTTQFMKVL-----VETRD----- 639
 Db 502 DPSPHLEWLLADGSKVRAPYVSEDRILIDKNGKLEQLQADSPDAGLYHICISTNDADAV 561
 QY 640 --YKIR--EGLSEATHSMALTFDYSYSAF-----CPITNFWLKRTHLAVVODLALSQCHCV 691
 Db 562 LTYRITVVEPYGESHGQVHTVVTGTLDPCLSTG-----VPDASIS--WI 608
 QY 692 FYGQOQVEGRNFRNQFPVLRFRFVDLFGNGFISTRITVTLSEGPVS--APNPT----- 743
 Db 609 LPGNTVFSQPSRDR-----QILNNGTLRLQVTP-KDQGHYQCVAAANPSGADPSS 657
 QY 744 -----LGDAPAGRTFDGLARVSVEVIRDIRVKNRVVFGSGNCTNLSEARAR 791
 Db 658 PKVSQKQGMQVHREAGSGGLGE--PNSVSLKQPASLK-----LSASALTGSEAGKQ- 711
 QY 792 LVGLASAYORQEKRVDMHLGALG--FLKQPHGLLFPFGMPNPSKSPNPQFWTILQ--R 847
 Db 712 ----VSGVHRKNKRDLLHRRRGDSTLRPRE--HRRQLPSARRIDPQWAALEKAKK 765
 QY 848 NOMPADKLTHEITTT-----IAVKRFTTEYAAINFINLPPTCIGELAQFYMANLILK 900
 Db 766 NSVP-----KKQENTTVKPVPLAVPLVELTDEKDSAGMI--PP----- 802
 QY 901 YCDHSQYLINTLTSITGARRPRDPSSVHLWRKDVTSAAADIETQAKALLEKTENLPELW 960
 Db 803 --DEEFMWLTKASGVPGRSPTADSGPVNHGFMTSASGTEVSTVNPOTLQ--SEHLPDFK 859
 QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFQAGNWGS-- 1006
 Db 860 LFSVINGTAVTKSMNPSIASKIEDTTNQNPFIIPP-SVAEIRDSA-----QAGRASSQS 912
 QY 1007 ---LNGGKNCVCLPFTDRTRFRFIACPRGGFI-----CPVTG---PSSGN 1045
 Db 913 AHPVTGGN-----MATYGHNTYSSFTSKASTVLQINPTESYGPQIPITGVSRPSSSD 966

RESULT 25
 US-09-802-318-2
 ; Sequence 2, Application US/09802318
 ; Publication No. US20020086825A1
 ; GENERAL INFORMATION:
 ; APPLICANT: Binat, et al
 ; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
 ; FILE OF INVENTION: AND USES THEREOF
 ; FILE REFERENCE: 540579-2007.1
 ; CURRENT APPLICATION NUMBER: US/09/802,318
 ; CURRENT FILING DATE: 2001-03-08
 ; PRIOR APPLICATION NUMBER: 09/632,862
 ; PRIOR FILING DATE: 2000-08-04
 ; PRIOR APPLICATION NUMBER: 60/207,821

;; PRIOR FILING DATE: 2000-05-30
;; NUMBER OF SEQ ID NOS: 25
;; SOFTWARE: Patent in version 3.0
;; SEQ ID NO 2
;; TYPE: PRT
;; LENGTH: 2597
;; ORGANISM: rattus species
;; FEATURE:
;; NAME/KEY: misc feature
;; LOCATION: (1)..(2597)
;; OTHER INFORMATION: 'x' can be any amino acid
US-09-802-318-2

Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY	416	AGHPLAANPQTD---RDGHVLSQSQTGSSNTE-----FSDVYLALICG 455
Db	274	SGAFLCTKPTIDPSLKSLSVTOEDNGSASTSPQDIEPFGSLSLNMTXXSGNKADMVCS 333
QY	456	FGAPILARLLFYLERCDAGATGGHDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511
Db	334	IQKP-----SRTSPATAFTENDYIM--LNASFSTNLVCSVDYHQPWQWLLALYS 382
QY	512	TVHRLQRMP-----RFGQATRPQIGVFGTWNQSYSCDPLGNYPYLLIRKPGD 561
Db	383	DSPLILERKPOLTFETPSLSRYKQVALRPEDIFTSIEADVRADEPFWQOEKIVLQLNRT 441
QY	562	QTEAAKATMQDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
Db	442	ATTLSTLQIQFSTDAQIALPRAEMRERLKWMTILMNNPKLERTVLVGGTIALSCPQKG 501
QY	602	-----LSSVIVDHTFR-----RILDTLRARIE-OTTTFQFMKVL---VETRD----- 639
Db	502	DPSHLEWLLADGSKVRAPVVSDEGRILIDKNGKLELMADSFAGLYHCISTNDADAV 561
QY	640	--YKIR--EGLSEATHSNMALTFFDYSGAF-----CPITNFLVKRTHLAVVQDLALSOCHVC 691
Db	562	LTYRITVVEPYGESTHDSGVQHTVVTGETLDLCLSTG-----VPDASIS---WI 608
QY	692	FYGOQVEGRNFRNQFVLRRRFVDLFNGGFISTRSITVTLSEGPVS--APNPT----- 743
Db	609	LPQNTVFSQPSRDR-----QILNNGTLRILOVT-PKQGHYQCVAAFPSGADPSS 657
QY	744	-----LGQDAPAGRTFDGLARVSVEVIRDIRVKNRVVPSGNCNTLSEARAR 791
Db	658	FKVSQVKKGQRMVHEHREAGGSLGE--PNSVSLKQPASLK-----LSASALTGSEAGKQ- 711
QY	792	LVGLASAYQOEKRVDMHMGALG--FLKQPHGLLFRGMPNPSKSPNQWFTLLQ---R 847
Db	712	-----VSGVHRKXKHRLIHRRGDSTLRRFRE--HRRQLPLSARRIDPQWAALEKAKK 765
QY	848	NOMPADKLTHEEITT-----IAAVKRFTTEYAAINFILPPTCIGELAQFYMANLILK 900
Db	766	NSVP-----KKQENTVVKPVLAPVPLVELTDEKDSGMI--PP----- 802
QY	901	YCHSQVILNTLSITTCARRPRDPSSVLHWIRKDVTSAADIEQAKALLEKTENILPELW 960
Db	803	--DEEFMVLTKASGVPGRSPTADSGFVNHGFMTSIASGTEVSTVNPQTLO--SEHLPDFK 859
QY	961	TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFOAGNWSG-- 1006
Db	860	LFSVTNGTATKSMNPSIAKIEDTTNQNIIIFP-SVAIRDSA-----QAGRASSOS 912
QY	1007	---LNGGKNVCPFTFDRTRRRIACRGGFI-----CPVTG---PSSGN 1045
Db	913	AHPVTGNN---NATYGHNTNTYSFTSKASTVLQINPTESYGFQIPITGVSPSSSD 966

RESULT 26

US-09-802-318-10

; Sequence 10, Application US/09802318

; Publication No. US20020086825A1

; GENERAL INFORMATION:

; APPLICANT: Binat, et al

; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE

; TITLE OF INVENTION: AND USES THEREOF

; FILE REFERENCE: 540579-2007.1

; CURRENT APPLICATION NUMBER: US/09/802,318

; CURRENT FILING DATE: 2001-03-08

; PRIOR APPLICATION NUMBER: 09/632,862

; PRIOR FILING DATE: 2000-08-04

; PRIOR APPLICATION NUMBER: 60/207,821

; PRIOR FILING DATE: 2000-05-30

; NUMBER OF SEQ ID NOS: 25

; SOFTWARE: Patent in version 3.0

; SEQ ID NO 10

; LENGTH: 2597

; TYPE: PRT

; ORGANISM: Rattus sp.

; FEATURE:

; NAME/KEY: misc feature

; LOCATION: (1)..(2597)

; OTHER INFORMATION: 'x' can be any amino acid

US-09-802-318-10

Query Match 1.9%; Score 120.5; DB 12; Length 2597;

Best Local Similarity 18.6%; Pred. No. 0.67; 287; Indels 233; Gaps 40;

Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;

QY 416 AGHPLAANPQTD---RDGHVLSQSQTGSSNTE-----FSDVYLALICG 455

Db 274 SGAFLCTKPTIDPSLKSLSVTOEDNGSASTSPQDIEPFGSLSLNMTXXSGNKADMVCS 333

QY 456 FGAPILARLLFYLERCDAGATGGHDALKYVTGTFDSEIPCSLCEKHTRPV---CAHT 511

Db 334 IQKP-----SRTSPATAFTENDYIM--LNASFSTNLVCSVDYHQPWQWLLALYS 382

QY 512 TVHRLQRMP-----RFGQATRPQIGVFGTWNQSYSCDPLGNYPYLLIRKPGD 561

Db 383 DSPLILERKPOLTFETPSLSRYKQVALRPEDIFTSIEADVRADEPFWQOEKIVLQLNRT 441

QY 562 QTEAAKATMQDTYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601

Db 442 ATTLSTLQIQFSTDAQIALPRAEMRERLKWMTILMNNPKLERTVLVGGTIALSCPQKG 501

QY 602 -----LSSVIVDHTFR-----RILDTLRARIE-OTTTFQFMKVL---VETRD----- 639

Db 502 DPSHLEWLLADGSKVRAPVVSDEGRILIDKNGKLELMADSFAGLYHCISTNDADAV 561

QY 640 --YKIR--EGLSEATHSNMALTFFDYSGAF-----CPITNFLVKRTHLAVVQDLALSOCHVC 691

Db 562 LTYRITVVEPYGESTHDSGVQHTVVTGETLDLCLSTG-----VPDASIS---WI 608

QY 692 FYGOQVEGRNFRNQFVLRRRFVDLFNGGFISTRSITVTLSEGPVS--APNPT----- 743

Db 609 LPQNTVFSQPSRDR-----QILNNGTLRILOVT-PKQGHYQCVAAFPSGADPSS 657

QY 744 -----LGQDAPAGRTFDGLARVSVEVIRDIRVKNRVVPSGNCNTLSEARAR 791

Db 658 FKVSQVKKGQRMVHEHREAGGSLGE--PNSVSLKQPASLK-----LSASALTGSEAGKQ- 711

QY 792 LVGLASAYQOEKRVDMHMGALG--FLKQPHGLLFRGMPNPSKSPNQWFTLLQ---R 847

Db 712 -----VSGVHRKXKHRLIHRRGDSTLRRFRE--HRRQLPLSARRIDPQWAALEKAKK 765

QY 848 NOMPADKLTHEEITT-----IAAVKRFTTEYAAINFILPPTCIGELAQFYMANLILK 900

Db 766 NSVP-----KKQENTVVKPVLAPVPLVELTDEKDSGMI--PP----- 802

QY 901 YCHSQVILNTLSITTCARRPRDPSSVLHWIRKDVTSAADIEQAKALLEKTENILPELW 960

Db 803 --DEEFMVLTKASGVPGRSPTADSGFVNHGFMTSIASGTEVSTVNPQTLO--SEHLPDFK 859

QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFOAGNWSG-- 1006

Db 860 LFSVINGTAVTKSNPNSIASKIEDTTNQNPIIIFP-SVAEIRDSA-----QAGRASSQS 912
QY 1007 ---LNGKNNVCLPFTFORTREFFIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN---MATYGHNTYTSFTSKASVLPQINPTESYGQIPIITGVSRPSSD 966
RESULT 27
US-09-802-318-13
; Sequence 13, Application US/09802318
; Publication No. US20020086825A1
; GENERAL INFORMATION:
; APPLICANT: Binat, et al
; TITLE OF INVENTION: GENES ASSOCIATED WITH MECHANICAL STRESS, EXPRESSION PRODUCTS THERE
; TITLE OF INVENTION: AND USES THEREOF
; FILE REFERENCE: 540579-2007.1
; CURRENT APPLICATION NUMBER: US/09/802,318
; CURRENT FILING DATE: 2001-03-08
; PRIOR APPLICATION NUMBER: 09/632,862
; PRIOR FILING DATE: 2000-08-04
; PRIOR APPLICATION NUMBER: 60/207,821
; PRIOR FILING DATE: 2000-05-30
; NUMBER OF SEQ ID NOS: 25
; SOFTWARE: PatentIn version 3.0
; SEQ ID NO 13
; LENGTH: 2597
; TYPE: PRT
; ORGANISM: Rattus sp.
; FEATURE:
; NAME/KEY: misc feature
; LOCATION: (1)-(2597)
; OTHER INFORMATION: 'x' can be any amino acid
US-09-802-318-13
Query Match 1.9%; Score 120.5; DB 12; Length 2597;
Best Local Similarity 18.6%; Pred. No. 0.67;
Matches 145; Conservative 113; Mismatches 287; Indels 233; Gaps 40;
QY 416 AGPHLAANPQD---RCHVLSSOSTGSSNTE-----PSVDYLALICG 455
Db 274 SGAFCTKPTTIDPSLKSKSLVTQDNGSASTSPDFTPEPGSLNMTXXSGNKADNVCS 333
QY 456 FGAPLLARLLFYLCRCDAFTGGHGALKKVTGTFDSEIPCSICEKHTFPV---CAHT 511
Db 334 IQKP-----SRTSPATFENDYIM--LNASFSTNLVCSVDYNIQVWQLALYS 382
QY 512 TVHRLQRM-----RFGQATQPIGVFTMNSQVSDCDPLGNYPAYILIRKPGD 561
Db 383 DSPILIRKPKQLTPTSLSSRYKQVALRPEDIFTSEADVR-ADPFWFQEQKIVLQLNRT 441
QY 562 QTEAAKATMQDYRATLERLFDLEQERL-----LDR-----GAPCSSEG 601
Db 442 ATTISTLIQISTDAQIALPRAEWAERLKWMTILMNNPKLERTVLVGTIALSCPGKG 501
QY 602 ---LSSVIVDHPFTR-----RILDTLRARIE-OTTQFMKVL---VETRD----- 639
Db 502 DPSPHLEWLLADGSKVRAPYVSEGRILIDKNGKLEQLQADSPDAGLYHCISTNDADAV 561
QY 640 --YKIR--EGUSEATHSNALTFDPSGNF---CPITNFLVKRTHLAVODLALSQCHCV 691
Db 562 LTYRITVVPYEGESTHSGVQHTVVVTGETLDPLCLSTG-----VPDASIS---WI 608
QY 692 FYGQOVGEGRNPRNQFPVLRFRFVLDLPNGGFISTRSTVTLSEGVPS--APNPT----- 743
Db 609 LPGNVTFSQPSRDR-----QILNNGTILRLQVT-PKQGHYQCVAANPSGADFSS 657
QY 744 -----LQCDAPAGRTFGDGLARVSVEVIRDKVRNVVFGNGCTNINSEARAR 791
Db 658 FKVSQKKQGRMVEHDEAGGSLGE-PNSGSVSLKQPSALK-----LSASALTGSEAGKQ- 711
QY 792 LVGLASAVQCRKRVDMHLHGALG-FLKQPHGLLFFPRGMPNPSKPNQPFWFTLLQ---R 847

Db 712 ---VSGVRKKNKRDLIHRRRGDSTLRFRB--HRRQLPSARRIDPQWAALEKAKK 765
QY 848 NQMPADKLTHEBITT-----IAAVKRFTEEYAAINFINLPPTTCIGELAQFYNANLILK 900
Db 766 NSVP-----KKQENTTVKPVPLAVPLVELTDEKDSAGMI--PP----- 802
QY 901 YCDHSOYLINTILTSIITGARRPRDPSSVLHWIRKDVTSAADTETQAKALLEKTEKTELPWL 960
Db 803 --DEEFVLKTKASGVPGRSPTADSGPVNHGFWMTSIASGTEVSTVNPQTLQ--SEHLPDFK 859
QY 961 TTAFTSTHLVRAAM-----NORPMVVLGISISKYHGAAGNNRVFOAGNWSG-- 1006
Db 860 LFSVINGTAVTKSNPNSIASKIEDTTNQNPIIIFP-SVAEIRDSA-----QAGRASSQS 912
QY 1007 ---LNGKNNVCLPFTFORTREFFIACPRGGFI-----CPVTG---PSSGN 1045
Db 913 AHPVTGNN---MATYGHNTYTSFTSKASVLPQINPTESYGQIPIITGVSRPSSD 966
RESULT 28
US-10-329-079-11
; Sequence 11, Application US/10329079
; Publication No. US20030198981A1
; GENERAL INFORMATION:
; APPLICANT: FARNET, Chris
; APPLICANT: ZAZOPOULOS, Emmanuel
; APPLICANT: STAPEA, Alfredo
; TITLE OF INVENTION: GENES AND PROTEINS INVOLVED IN THE BIOSYNTHESIS OF LIPOPEPTIDES
; FILE REFERENCE: 3002-1105
; CURRENT APPLICATION NUMBER: US/10/329,079
; CURRENT FILING DATE: 2002-12-24
; NUMBER OF SEQ ID NOS: 66
; SOFTWARE: PatentIn version 3.0
; SEQ ID NO 11
; LENGTH: 5245
; TYPE: PRT
; ORGANISM: Streptomyces fradiae
US-10-329-079-11
Query Match 1.9%; Score 120; DB 14; Length 5245;
Best Local Similarity 20.2%; Pred. No. 2.6; Indels 464; Gaps 68;
Matches 282; Conservative 138; Mismatches 434;
QY 102 PSSAAPNLTRACNAARERFGSRGCGPP---VDGAVETTGAEICTRL-----GL 147
Db 464 PAAEPAADGLEAVECDTFAQAAATPEAPAVVGGPVALTFAEADARVSRLARLLISRGA 523
QY 148 EPENTILYLVTALPKEAVFMCNVFLHYGGLDIVINHGDVIRIPLFPVQLFMPDVNRLV 207
Db 524 GPE---VRVAVCLDRNALWPTTV-----LAVLRSGAVHVPL----- 556
QY 208 PDPFNTHRSIGEGFYPTFPYNTGLCHLIHDCVIAPMAVALRVNRVNTAVARGAAHLAF- 266
Db 557 -DPSRSPHER-----LAAVERD--VAPLLVLAERATEAAVADLAAPVLV 597
QY 267 -DENHEGAV-----LPDITYTFQSSSSG-----TTTARG-----A 297
Db 598 DDPSTEAAIDALDQPGVTDADRTAPLLPGHAAVYIHTSGTGRPKGVTVDRHGLSRLLQA 657
QY 298 RENDVNSTSKPSGSG-GPERLASI-----MAADTALHA----- 330
Db 658 HRRVTSRIRPSAGGPGRAAHVSSFSFDASWDPLLAVAGHELEHMDLDRFPDPGVAY 717
QY 331 -----EVIFNTGIYEE---TPT-----DIKEMPMFIGMEGTLPRLNAL 365
Db 718 FRDRRIDYVDLPTVFRSLDAGLLEEGFPCCPSLVALGGEAMDGELWELRAAARVVTAM 777
QY 366 GSY-----TARVA-----GVIGAMVFPNSALYLTVEVDSGMEAKDGGPSPFNR 411
Db 778 NTYGPETETAVDAVTVLGDLPFGTIGRPV--PRWEAY---VLDAGLRPVPPGVGLGELY-- 830
QY 412 FYQFAGPHLAANPQDTRDGHVLSOSQSTGSSNTEFSVDVLALICGEGAP-----LILAR 463

Db 831 ---LAGPVARGVGLG---HALTAER-----FVACPFKPCGERMYRTGDLAR 871
QY 464 L-----LFYLERCD-----AGAF-----TGGHGDAIKYV 487
Db 872 WLPDGHVAVYVGRDEQVKIRGFRIEPEGEVEAALRELEGVAAAATVREDTPTGTRRLGVV 931
QY 488 TGTDFSEIPCSLCEKHTRPVCAHTVHRLRQMP-----REGQATRQPIGVFTWNSQY 541
Db 932 VGTDPDAD-----DAKLSPA-----EVLARLDRDLPHVPSAFVRLBELPVNTSGKLDRA- 981
QY 542 SDCDPLGNVAPYLILRKPGDQTEAAKATQDVTYRATLERLFIDLEQERLLDRGAPCSSRG 601
Db 982 --ALPAPDPADPPAGRRP-----RTALESEVCALPAEVL-----G 1014
QY 602 LSVIVDHTFRILDTLARIQTTOFMKVUVETRDYKIREGLSEATHSMALTFDPDYS 661
Db 1015 AGSVGIDDDFFGGRGDSILS-----IQVGSAR-----RAGL-----TFTYRQVFEFLT 1058
QY 662 GAFCEPITNPLVKKTHLAVQDLALSQCHCVYGOQVEGRNFRNQFOVPLRRFRFVDFLNGG 721
Db 1059 PAALAAA---ARRIDAGDEDPALA-----VGP-----LPLLPVVAETLAAGG 1098
QY 722 FISTRSITVLSGPPVSAFNPTLQDAPAGRTFDGLARVSVEV-----IRDIRVKNR- 774
Db 1099 PVHSYNQSVVLASPPDAAPDDV--RDALQALLDRHDALRVHAAPAGPGLWDLRVEEAG 1156
QY 775 VVESGNC-----TNLS--EAAEARLVGLASAYORQEKVDMHLGALGELLKQFHCLLFP 826
Db 1157 TAAERCLRIDATGMSDEBLAQAQAAVTA-----RACLDPLAGAL-----VSAVWFD 1206
QY 827 RGMFP-----NSKSPNQW-----FWTLQRNQMPADKLTHBEEITIAAVKRF 869
Db 1207 RGRPGLVLVIHHLAVDGVSVRIILGLDREAWRALRAGERPELPTGTSLATWAT--RL 1264
QY 870 TEBYAAINFNLPTTCIGELAQYMANLILKYCDHSQYLINTLSIITGARRPD--PSS- 927
Db 1265 TERAT-----DPAVTAQL--DHWATLADGAPGSRPLDRTRDTVATSAVLSGELPASL 1316
QY 928 -----VLHWI--RKDVTSAADTETQAKALLEKTENL----- 956
Db 1317 TDLGLPAPAPAFAGVNDLLITAFALAVAHWEEDAPVLVDLESHG-----RTEELVPG 1371
QY 957 PELWTTA--FTSHLVRAAMNQPMVMVLGISISKYHGAQN-----NRVFOAGNWSGLNG 1009
Db 1372 ADLSRTVGNFTSVHPVRLAAGR-----VTAADLAERAPAVGDAIKRIKEQLRAVPDGGGLGH 1427
QY 1010 G--KNWCP-----LFTFDRTRRFLIACPPGGFICPV--TGPSSGNRETTLSQ 1053
Db 1428 GLLRLHLPDTAPRLGLARARFQNLGRFAEQGAGEDSWPLGSGPAGQHPDPLDHE 1487
QY 1054 VRGIIVS-----GGAMVOLAIYAVTVVAVGARQAQHVAFDDWLSLTDDEFLARDLEELHDQ 1108
Db 1488 IEVNVVTAEGPDGPRLLITRWYATGL-----LTBEE----- 1518
QY 1109 IIOLETPWTEGALSAVKILDEKTTAG--DGETPTNLA 1145
Db 1519 -VRLTRSWSL--ALHAV--VGHATABGAGGUSPSDVA 1551

RESULT 29
US-10-425-114-71520
; Sequence 71520, Application US/10425114
; Publication No. US20040034888A1
; GENERAL INFORMATION:
; APPLICANT: Liu, Jingdong
; APPLICANT: Zhou, Yihua
; APPLICANT: Kovalic, David K.
; APPLICANT: Screen, Steven E.
; APPLICANT: Tabaska, Jack E.
; APPLICANT: Cao, Yongwei
; TITLE OF INVENTION: Nucleic Acid Molecules and Other Molecules Associated With
; TITLE OF INVENTION: Plants and Uses Thereof for Plant Improvement
; FILE REFERENCE: 38-21(53313)B

; CURRENT APPLICATION NUMBER: US/10/425,114
; CURRENT FILING DATE: 2003-04-28
; NUMBER OF SEQ ID NOS: 73128
; SEQ ID NO 71520
; LENGTH: 452
; TYPE: PRT
; ORGANISM: Zea mays
; FEATURE:
; OTHER INFORMATION: Clone ID: UC-ZMFLB73270E12_FLI pep
US-10-425-114-71520

Query Match 1.9%; Score 118; DB 12; Length 452;
Best Local Similarity 22.7%; Pred. No. 0.052;
Matches 91; Conservative 36; Mismatches 132; Indels 142; Gaps 22;

QY 195 PVQLFMPDNLVLPDPNTHRSIGEGFVPTPPYNTGLCHLHDCVIAPMAVALRVNV 254
Db 90 FVQWRPVPVSTEAPQ---HH---QDDIETS--NSGSKIIEDCI----- 126
QY 255 TAVARGAAHLAFDENHGAFLVPPDITVTFQSSSGTGTARGARRNVNSTSKPSPG-- 312
Db 127 -----ASSN-----LPPD-----GTTNVVETANDASSSKNLSFGYS 160
QY 313 -----GFERRLA-----SIMAADT-----ALHAEVIFNT 336
Db 161 STKVVIDHAEISGFKDLAGSNVFGTHSSSVEAVQSRQLDYSHFISLPLALHPDLVNL 220
QY 337 GIYETPTDIKEMPFMGECTLPRNLALGSYARVAGVICAMVFPNSALYLTEVEDSG 396
Db 221 NYFOSS-----ILGEENS-----NRGQSQS---EGSIGEMDY-----DHK 252
QY 397 MTEAKDGGPGSFNRYQ---FAGP---HLAA-----NPQTRDGHVLSQSST---G 439
Db 253 QAEAKWAKGKSQSGFDGDKSIFIKPETPHLTVMKLWNERIDKASDVLQSVSTQVNEA 312
QY 440 SSNTEFSVDYLLICGAPLALRLBYLERCDAAGTGGHGDALKVYTGTFDSEI PCSL 499
Db 313 LENRPI SIQLRGLTCKMGFPKARVW--YVPVLEVS--EGRLAHACKVITDAF---IKAGL 367
QY 500 C-EKHTPVCATHTVHRLRQMRPFQAT-----RQPIGVFG 535
Db 368 VFERDRELKHAIVMVRHRSKRNKENTWTDSPDARGIFG 408

RESULT 30
US-10-084-846A-8
; Sequence 8, Application US/10084846A
; Publication No. US20040006026A1
; GENERAL INFORMATION:
; APPLICANT: WEITNAUER, GABRIELE
; APPLICANT: MUHLENWEG, AGNES
; APPLICANT: TREFFZER, AXEL
; APPLICANT: BECHTHOLD, ANDREAS
; TITLE OF INVENTION: AVILAMYCIN DERIVATIVES
; FILE REFERENCE: 1974-005
; CURRENT APPLICATION NUMBER: US/10/084,846A
; CURRENT FILING DATE: 2003-02-25
; PRIOR APPLICATION NUMBER: PCT/EP01/09815
; PRIOR FILING DATE: 2001-08-24
; PRIOR APPLICATION NUMBER: DE 101 09 166.4
; PRIOR FILING DATE: 2001-02-25
; NUMBER OF SEQ ID NOS: 120
; SOFTWARE: Patentin Ver. 3.2
; SEQ ID NO 8
; LENGTH: 19608
; TYPE: PRT
; ORGANISM: Streptomyces viridochromogenes
; FEATURE:
; OTHER INFORMATION: Protein 3: amino acid sequence encoded by coding strand 1.
; OTHER INFORMATION: Start codon: atc, Start position: nucleotide 3.
US-10-084-846A-8

Query Match 1.9%; Score 118; DB 15; Length 19608;

[illegible]

```

Db      12590 CQODAWPSIAGCSVR--SVRSTMSLMVGSFQKMLAGTS-----RPRRF----- 12631
QY      1033 GRICPVTGPSSGNRETTLSQVRGIIVSGAMVQLAIYATVVRVAGARAQHMAFDWLUSL 1092
Db      12632 -----SSRRRTTIVITESSPSTSG-----RRTCRVAGASRISCAI---CSR 12670
QY      1093 TDDEFLARLDELHQIIQTLETPWTVEGALEAVKILDEKTTAGDGETNLAFNFDSC 1152
Db      12671 TSS-----TRRSSGD-----R 12684

QY      1153 PSHTTNSVLNISGSNIGS 1172
Db      12685 PANDTTASASPPGSGSVSGA 12704

RESULT 31
US-10-231-956A-325
; Sequence 325, Application US/10231956A
; Publication No. US2004005233A1
; GENERAL INFORMATION:
; APPLICANT: Lorens, James B.
; APPLICANT: Xu, Weiduan
; APPLICANT: Bogenberger, Jakob
; APPLICANT: Holland, Sacha
; APPLICANT: Rigel Pharmaceuticals, Incorporated
; TITLE OF INVENTION: Modulators of Angiogenesis
; FILE REFERENCE: 021044-004100US
; CURRENT APPLICATION NUMBER: US/10/231,956A
; CURRENT FILING DATE: 2001-08-30
; NUMBER OF SEQ ID NOS: 522
; SOFTWARE: FastSeq for Windows Version 3.0
; SEQ ID NO 325
; LENGTH: 1479
; TYPE: PRT
; ORGANISM: Homo sapiens
US-10-231-956A-325

Query Match      1.8%; Score 114.5; DB 12; Length 1479;
Best Local Similarity 18.5%; Pred. No. 0.97;
Matches 204; Conservative 118; Mismatches 441; Indels 341; Gaps 47;

QY      162 FKEAVFMCVNLFHYGLDVIHNGDVTRIPFPVQLFMPD--VNRLVPDPPTHRSIG 219
Db      130 FKGLASLEQLYLHFNQIET--LDPSFQHLPKLE-RLFLHNNRITHLVPGTEN-HLESMK 185
QY      220 EGFVYTFPTNTGLCHLHDVCVIAPIAVALRVNRTAVARGAAHLAFDENHEGAVLPDPI 279
Db      186 RLRLDS-----NTLHC-----DCELLWADLLKTYASGNAQAARI CEYPRR----- 227
QY      280 TYTYFOSSSGTITARGARNVDNVSFKSPSGGFERRLASINAADTALHAENVINTGIY 339
Db      228 ----IQGRSVATITPEELNCERPRITSEPO-----DADVTSGNTVY 264
QY      340 EETPTDIKEWPMETIGMEG-----TLPRNAL-----GSYARVAGVIG 377
Db      265 FTCAEAGNPKEIILWLNNELSMKTDSRLNLLDGLTMIQNTQETDQGIYQCMKAVAG 324
QY      378 AMVFPSPNALYLTEVEDSGMTEAKGGPGFSPNRFYQFAGPHLAANPQTR-----DGHVL 433
Db      325 -----EVTQEVTLRYFGSP-----ARPTFVIQPNTEVLVGESVTL 361
QY      434 SSOSTG-----SSNTEFSVDYALICGFGAPLLARLLFYLERCDAGFTGGHGA 483
Db      362 ECSATGHPPRPRIWTRGDRTPLEVPDRVNITPSGG-----LYIQ-----NVVQDGSGEY 410
QY      484 LKYVTGTFDSEIPCSELCERKTRPVCAHTTHVRLQRMPRFQATROPIGVFG-TMNSQVS 542
Db      411 ACSATNNIDS-----VHATAFIIVQALPQFTVTPQDRVVIEGQTVDFQ--- 453
QY      543 DCDPLGNAYPIILRFGDQTEAKATMDQTYPATLERLFDLEQERLLDRGA-PCSSSEG 601
Db      454 -CEAGNPPVPIAWTKGGSLSV-----DRRHVLVSSTGLRISGVALLHQQYEQCAVN 506

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Db 961 -----SGKPLLPATGPPT-----CMRDENESP 984

QY 1034 FICPVTGSSGNRETTLSQ-----VRGIIVSGAMVQL-----AIYATVVRAVGARAQ 1082

Db 985 IPCFLAGDHANEQLGLTSMHTLWFRHNRIATELLKLNPHWDGDTIYYETRKIVGAETQ 1044

QY 1083 HMAFDDWLSLTDDEFLARLDELH 1106

Db 1045 HITYQHWPILGEVGMRTLGEYH 1068

RESULT 33

US-10-021-660-125

Sequence 125, Application US/10021660

Publication No. US20030152926A1

GENERAL INFORMATION:

APPLICANT: Murray, Richard

APPLICANT: Glynnne, Richard

APPLICANT: Watson, Susan R.

APPLICANT: EOS Biotechnology, Inc.

TITLE OF INVENTION: No. US20030152926A1el Methods of Diagnosis of Angiogenesis, and Methods of Screening for Angiogenesis

TITLE OF INVENTION: Compositions and Methods of Screening for Angiogenesis

TITLE OF INVENTION: Modulators

FILE REFERENCE: 018501-000710US

CURRENT APPLICATION NUMBER: US/10/021.660

CURRENT FILING DATE: 2001-12-06

PRIOR FILING DATE: 2001-02-14

PRIOR APPLICATION NUMBER: US 09/637,977

PRIOR FILING DATE: 2000-08-11

NUMBER OF SEQ ID NOS: 135

SOFTWARE: FastSeq for Windows Version 3.0

SEQ ID NO 125

LENGTH: 1496

TYPE: PRT

ORGANISM: Homo sapiens

US-10-021-660-125

Query Match 1.88; Score 114.5; DB 14; Length 1496;

Best Local Similarity 18.58; Pred. No. 0.99;

Matches 204; Conservative 118; Mismatches 441; Indels 341; Gaps 47;

QY 162 FKEAFVNCVFLHYGGDIYVHNGDVIRIPLFFVQLFMPD--VNRLVDPDPFNTHRSIG 219

Db 147 FKGLASLEQLYLFHNQIET--LDPDSFQHLPKLE-RLFLHNRIITHLVPGTFN-HLESMK 202

QY 220 EGFVYPTFTNGLCHLHCVIAPMAVALRVNVTAVARGAAHLAPDENHEGAVLPDDI 279

Db 203 RLRLDS-----NTLHC-----DCEILWLADLLKTVAESGNAQAACEYPRR-----244

QY 280 TTYTFQSSSGTITARGARNVNSTKSPSGGFERRLASIMAADTALHAEIFNTGIY 339

Db 245 ----IQRSVATITPELNCERPRITSEPO-----DADVTSGNTVY 281

QY 340 EETTDIKENPMFTMGEG-----TLPRNAL-----GSYTRAVAGVIG 377

Db 282 FTRCAENPKPEIILWLNNSLSMKTDSRLNLDGTLMIQNTQETDQGIYQCAKNVAG 341

QY 378 AMVSPNSALYLTVEDSGTAEKXGGPGSFNRFYQFAGPHLAANPQTDK-----DGHVL 433

Db 342 -----EVKQEVTLRVFGSP-----ARFTFYIQNTVELVGSVTL 378

QY 434 SSQSTG-----SSNTFSVDYIALICGFGAPILARLLFYLERCDAGFTGGHGA 483

Db 379 ECSATGHPPPRISWTRGDRTPLPVDPVRVNIPTSGG-----LYIQ-----NVVQGDSEY 427

QY 484 LKYVTGTFDSIPCSLCEKHTRPVCAHTTVHRLQRMRPQATRPQIGVFG-TMNSQYS 542

Db 428 ACSATNNDS-----VHATAPIIICALFOFTVTPQDRVIEGQIVDQ-- 470

QY 543 DCDPLGNVAPYLIRKPGDQTEAAKATMQDTYRATLERFLFIDLEQERLLDRGA-PCSSSEG 601

Db 471 -CEAKGNPPVIAWTKGSQLSV-----DRHLVLSGGTLRISGVALHDQGOVECCAVN 523

QY 602 L--SSVVDHPTFERILDLTRARIEQTTQFMKVLVETRDYKIRGLSEATHSVALTFDP 659

Db 524 IIGSKVVAHLUTQPRVTPFASIPSTT-----VEGVANVOLPCSSQGEPEPAITWNK 577

QY 660 YSGAFCEITFLVKRTHLAVVQDLA---LSQCHCVFYQQQVEGRNF--RNOQFQVLARRR 714

Db 578 DGVQVTEGKPHISPEGFLTINDVGPADAGYECV-----ARNTIGSASVMVLSVNV 630

QY 715 VDLFNGG--FIST-----RSITVT---LSEGPVSAPNPTLG-----QDA 748

Db 631 PDVSRNGDPFVATSIVEAIAITVDRAINSTRHLFDSRPSRPNLLALFRYDRDPTVEQA 690

QY 749 PAGRTFDGLARVSVEVIRDIRVK-----NRVVFSGNCTNLSEAAAR 791

Db 691 RAGSIFERTLQIQEHVQHGLMVDLNGTSYHNDLVSPQYLNLIANLSGCT-----AHR 745

QY 792 LVGLASAYQROEKV-----DMLHGLGFLLLKQFHGLL-----FPRGMPPN---832

Db 746 VNNCSDMCFHOKYRTHDGTNNLQHPMWSGLTAFERLLKSVYENGFTPRGINPHRLYN 805

QY 833 -----SKSPNPQWFTLLQRNOMPADKLTHEEITIAAVK--RFTTE 872

Db 806 GHALPMPRLVSTTLIGTETVTPDEQFTHMLMQGF---LDHLDLSVVALSQARPSDG 861

QY 873 YAAINFINLPPTCI-----GELAQFYVAMILKYCDHSQVYLINTLSITGA 919

Db 862 QHCSNVCSNDPPCFVMPNDNRARSARGCMFVRS-----SPVCGSGMTSLMNS 913

QY 920 RRPDPSSVLHWIRKDVTSADIEQAKALLEKTENPELWTFTASTH--LVRAAMNQR 977

Db 914 VYPREQINQL-----TSYIDASNVYGSTHEARSIDL-----ASHRGLLRQGIQR 960

QY 978 PMVLGISISKYHGAAGNNRVFOAGNWSGLNGKGVNCPFTFTDTRRFIIACPR---GG 1033

Db 961 -----SGKPLLPATGPPT-----CMRDENESP 984

QY 1034 FICPVTGSSGNRETTLSQ-----VRGIIVSGAMVQL-----AIYATVVRAVGARAQ 1082

Db 985 IPCFLAGDHANEQLGLTSMHTLWFRHNRIATELLKLNPHWDGDTIYYETRKIVGAETQ 1044

QY 1083 HMAFDDWLSLTDDEFLARLDELH 1106

Db 1045 HITYQHWPILGEVGMRTLGEYH 1068

RESULT 34

US-10-331-496A-28

Sequence 28, Application US/10331496A

Publication No. US20030228305A1

GENERAL INFORMATION:

APPLICANT: FRANTZ, GRETCHEN

APPLICANT: HILLAN, KENNETH J.

APPLICANT: PHILLIPS, HEIDI S.

APPLICANT: POLAKIS, PAUL

APPLICANT: SMITH, VICTORIA

APPLICANT: SPENCER, SUSAN D.

APPLICANT: WILLIAMS, P. MICKEY

APPLICANT: WU, THOMAS D.

APPLICANT: ZHANG, ZEMIN

TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR THE DIAGNOSIS AND

TITLE OF INVENTION: TREATMENT OF TUMOR

FILE REFERENCE: P5014R1-PCT

CURRENT APPLICATION NUMBER: US/10/331.496A

CURRENT FILING DATE: 2002-12-30

PRIOR APPLICATION NUMBER: US 60/345,444

PRIOR FILING DATE: 2002-01-02

PRIOR APPLICATION NUMBER: US 60/351,885

PRIOR FILING DATE: 2002-01-25

PRIOR APPLICATION NUMBER: US 60/360,066

PRIOR FILING DATE: 2002-02-25

PRIOR APPLICATION NUMBER: US 60/362,004

PRIOR FILING DATE: 2002-03-05


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; PRIOR APPLICATION NUMBER: US 60/366,869
; PRIOR FILING DATE: 2002-03-20
; PRIOR APPLICATION NUMBER: US 60/366,284
; PRIOR FILING DATE: 2002-03-21
; PRIOR APPLICATION NUMBER: US 60/368,679
; PRIOR FILING DATE: 2002-03-28
; PRIOR APPLICATION NUMBER: US 60/404,809
; PRIOR FILING DATE: 2002-08-19
; PRIOR APPLICATION NUMBER: US 60/405,645
; PRIOR FILING DATE: 2002-08-21
; NUMBER OF SEQ ID NOS: 95
; SEQ ID NO 28
; LENGTH: 1496
; TYPE: PRT
; ORGANISM: Homo sapien
US-10-331-496A-28

Query Match
Best Local Similarity 1.8%; Score 114.5; DB 15; Length 1496;
Matches 204; Conservative 118; Mismatches 441; Indels 341; Gaps 47;

QY 162 FKEAVFMCNVLHYGGDLIVHINHGDIIRIPFPVOLFMPD--VNRLLVPDPFNTTHRSIG 219
DB 147 FKGLEQLYLFNFQIET--LDPSFQHLPKLE-RLFLHNNRITHLVPGTEN-HLESKM 202
QY 220 EGFVYPTFPYNTGLCHLHDCVIAPIAVALRVNVTAVARGAAHLAFDENHEGAVLPDDI 279
DB 203 RLRLDS-----NTLHC-----DCEILWLADLLKTYAESGNAQAAACEYPRR----- 244
QY 280 TYTYFQSSSGTITARGARNVDNSTSKPSPSGFERRLASIMAADTALHAEVIENTGIY 339
DB 245 -----IQGRSVATITPEELNCERPRITSEPO-----DADVTSGNTVY 281
QY 340 EETPTDIKEWPMFIGMEG-----TLPRNLAL-----GSYARVAVGVIG 377
DB 282 FTCRAEGNPKPEIILWRNNNELSMKTDRLNLLDDGTLMQNTQETDQGIYQCMARNVAG 341
QY 378 AMVFSNSALYITEVEDSGMTEAKGPGPSFNRFFQFAGPHLAANPOTDR-----DGHVL 433
DB 342 -----EVKTQEVTLRYFGSP-----ARPTFVIQPNTEVLVGSVTL 378
QY 434 SSQSTG-----SSNTFSVDYLALICGFGAPLLARLLFYLERCDAGFTGGHGA 483

RESULT 35
US-10-276-774-1957
; Sequence 1957, Application US/10276774
; Publication No. US20040053245A1
; GENERAL INFORMATION:
; APPLICANT: Hyseq, Inc.
; APPLICANT: Tang, Y. Tom et al
; TITLE OF INVENTION: No. US20040053245A1el Nucleic Acids and Polypeptides
; FILE REFERENCE: 21272-030
; CURRENT APPLICATION NUMBER: US/10/276,774
; CURRENT FILING DATE: 2002-11-18
; PRIOR APPLICATION NUMBER: 09/560,875
; PRIOR FILING DATE: 2000-04-27
; PRIOR APPLICATION NUMBER: 09/496,914
; PRIOR FILING DATE: 2000-02-03
; NUMBER OF SEQ ID NOS: 2700
; SOFTWARE: Custom
; SEQ ID NO 1957
; LENGTH: 1498
; TYPE: PRT
; ORGANISM: Homo sapiens
US-10-276-774-1957

Query Match
Best Local Similarity 1.8%; Score 114.5; DB 12; Length 1498;
Matches 204; Conservative 118; Mismatches 441; Indels 341; Gaps 47;

QY 162 FKEAVFMCNVLHYGGDLIVHINHGDIIRIPFPVOLFMPD--VNRLLVPDPFNTTHRSIG 219
DB 147 FKGLEQLYLFNFQIET--LDPSFQHLPKLE-RLFLHNNRITHLVPGTEN-HLESKM 202
QY 220 EGFVYPTFPYNTGLCHLHDCVIAPIAVALRVNVTAVARGAAHLAFDENHEGAVLPDDI 279
DB 203 RLRLDS-----NTLHC-----DCEILWLADLLKTYAESGNAQAAACEYPRR----- 244
QY 280 TYTYFQSSSGTITARGARNVDNSTSKPSPSGFERRLASIMAADTALHAEVIENTGIY 339
DB 245 -----IQGRSVATITPEELNCERPRITSEPO-----DADVTSGNTVY 281
QY 340 EETPTDIKEWPMFIGMEG-----TLPRNLAL-----GSYARVAVGVIG 377
DB 282 FTCRAEGNPKPEIILWRNNNELSMKTDRLNLLDDGTLMQNTQETDQGIYQCMARNVAG 341
QY 378 AMVFSNSALYITEVEDSGMTEAKGPGPSFNRFFQFAGPHLAANPOTDR-----DGHVL 433
DB 342 -----EVKTQEVTLRYFGSP-----ARPTFVIQPNTEVLVGSVTL 378
QY 434 SSQSTG-----SSNTFSVDYLALICGFGAPLLARLLFYLERCDAGFTGGHGA 483
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[illegible]

Search completed: June 3, 2004, 07:14:06
Job time : 562 secs